



The Royal Gold Medal

ADDRESS BY MR. PAUL WATERHOUSE, M.A., THE PRESIDENT

*Presentation to Sir John J. Burnet, A.R.A., R.S.A., Hon. LL.D. Glasgow, at the General Meeting,
Monday, 25 June 1923*

OUR Gold Medal night is for three reasons the best night of our year.

I put first among these reasons the fact that on this occasion, as often as it occurs, we recognise the substantial reality of the Royal protection under which we live. I do not merely mean that a tangible and ponderable piece of gold passes literally from Buckingham Palace to Conduit Street, though that in itself would be an act of kingly favour which we should all here appreciate, but that, by a deed of gracious symbolism, the grace of which is by no means either empty or formal, our monarch does actually submit us to the duty of making a choice on his behalf, does actually according to his Royal pleasure confirm our choice, and further does great honour to the President of the moment by allowing him to administer the Royal gift.

The second reason is that on this annual festival we bring to fulfilment the annual exercise of what may be called our critical generosity. Architects, though no outsider would guess it, are not always free from the chagrin of rivalry. I would not breathe the word jealousy, even if I were to whisper the word envy. But I have known circles in which the discussion of contemporary architecture was more tempered with justice than mercy, and a justice at that in which reproof was more conspicuous than applause.

But when the Gold Medallist is being sought for these feelings are absent. I have been in my time on many a Gold Medal Committee. I am unwilling to say that those committees have never made mistakes, but I can say that I have never known judgment marred by misguided partiality, malice or bias.

The contest has often been keen—as indeed it should be—for the prize is great and the competitors are good and many, so that those on whom falls (with the Council) the task of selection have often an embarrassing discrimination to effect. But the embarrassment I can truly say is never tinged with any spirit but that of the apparent equalities of claimants. Claimants I say, but the word is disastrous, for it can rarely if ever have happened that the medal has gone to one whose own voice has been raised in his favour. No, gentlemen, it is with ungrudging appreciation on the part of the selectors and with unassuming modesty on the part of the recipient that this world-honoured gift from the throne of old England finds its way from Giver to Receiver.

And the third reason of this evening's outstanding pleasure is the climax of the event itself. That an architect or an advancer of architecture should stand forth in an assembly of representative architects of this country as the one man, British or

foreign, chosen as the worthiest to receive their passing plaudits and their more permanent homage is as an event and a spectacle, something to move the heart, something to stimulate the young, something to vitalise in the minds of all the keenest sense of the nicety and brotherhood of art.

It is known to you all—for the Institute has spoken it, and His Majesty has graciously confirmed the word spoken—that the man on whom our purpose has been unanimously bent in this year's decision is

SIR JOHN JAMES BURNET,

an Associate of the Royal Academy of Arts and an Academician of the Royal Scottish Academy. His honours already are many. He holds the Doctorate of the University of his native Glasgow; Paris has given him that coveted distinction, honorary corresponding membership of the Institut de France, and twice has he won (in bronze and in gold) the medal of the Salon.

Of his executed works we all have knowledge, and among most Londoners that knowledge will relate chiefly to those works of his that are well-known landmarks in our own town.

There is no injustice in this, for our London examples are very interestingly typical of certain differences of method in Sir John's art.

The north front of the British Museum will, I expect, long remain a criterion of his genius, and it is a test of which its designer may well be proud. I have many a time preached a small sermon upon it, pointing out to young architects that only a man of the first rank would have had the continence and modesty to refrain from breaking the cool rhythm of that colonnade by an assertive central feature.

There is consummate art in the skill with which the central doorway receives just sufficient emphasis and no more. Centrality is here rather respected than encouraged or acclaimed. The very lions, a lovable pair, perform their duty with self-suppression, and not with emphasis.

In fact, so triumphant is the riot of reserve that I could grudge that little bit of decoration which on the metal work over the cornice whispers, "Here is the middle."

I have no idea where Sir John would place General Buildings in his own scale of comparative excellence, but I confess that to me it comes high. Its situation is happy on a convex frontage playing a movement of contrary flexure with the normal concavity of the Aldwych sweep. Sir John handles

his theme with a boldness worthy of the site and its size. He takes as his ground floor theme the motive which we may, I believe, respectfully call the Burnet architrave, a great granite ribbon, a yard wide, which rushes up the sides and, duly mitred, flings itself across the top, graceful with the general curve of the frontage, and grateful as any curved lintel would be for the support of the two massive columns which are the monarchs of the lower design. Behind the three-bay design thus formed on a segmental plan stands in a straight line and in delicate counter-rhythm the five-bay composition of the actual window plane.

In totally different methods, different from this and from one another, are the Institute of Chemistry in Russell Square and the Kodak building in Kingsway. Both are evidences of the wish of the designer for fitness and directness, both a protest against that inflexibility of architectural invention which would make a man stamp with one family countenance buildings that bear no relationship to one another.

The Kodak Building, standing as it does in a street of structures which, if not pharisaic in propriety, are at least fairly normal in their adherence to an accepted level of architectural dressiness, is Sir John's great protest. As such it is admirable. The measure of the value of all protestantism varies inversely with the value of the thing protested against. A protest takes its own risks. It may not be the protester's fault if it outlives its purpose. Sir John himself will have wondered whether it wisely chose its place.

In Adelaide House, known at present by drawings only, we are happy to feel that Sir John is in control. Given the necessity for anything so vast, it is imperative that it should be handled by a giant. No architect could be trusted with it save a man with a great sense of mass and scale. In scale, in mass, our Gold Medallist is an expert, and we are happy, Sir John, to think that so great a responsibility is in the hands of one whose thought and execution are large.

Oxford Street, again, has its giant, and you are again the—I must not say the "giant-killer." Shall I say the giant's *nurse*, adding the conviction that you will not only nourish it into comely manhood but render it harmless to its smaller neighbours. I for one am happy in the certainty.

I am glad to be one of those to whom your works outside London are not unknown. I have prowled



GENERAL ACCIDENT, FIRE AND LIFE ASSURANCE CO.'S BUILDINGS, ALDWYCH, W.C.



INSTITUTE OF CHEMISTRY, RUSSELL SQUARE—GENERAL VIEW



FINE ART INSTITUTE, SAUCHIEHALL STREET, GLASGOW—INTERIOR

THE ROYAL GOLD MEDAL

round and into the great Bath house at Alloa, I have more than once turned back in Princes Street to have another look at the ingenuity of Forsyth's shop, I have admired the subtle change of character between it and the stores in George Street, a change which typifies, I think, the different characters of the two businesses. I have lingered outside the Glasgow Athenæum, and have considered with a respectful smile the adroitly grave frivolity of the Alhambra in the same city.

Ladies and gentlemen, Sir John will have pardoned me, and you will have pardoned me also, I hope, for having looked at his work in the light in which I think he has designed it. It is not work which a man or woman with any sort of brain can pass with a mere "good" or "bad," still less with indifference.

Indeed, so often have I studied it, always with some stirring of my own thought, and so often will most of you have studied it also, that it would have been a mere insult to Sir John and a great deprivation to ourselves if silence had been kept

over those qualities which so alluringly arrest the attention.

Sir John James Burnet, it is in the name of His Majesty and on the most cordial initiative of your fellow British architects that this medal is given to you. I am the most fortunate channel of the transfer from the King to yourself, and I hope you will allow me to say with what pleasure and pride I now perform the last official act of my Presidency.

Addressing the French Delegates of the Franco-British Union of Architects who were present, the President said :

Messieurs les confrères français, notre ami Sir John Burnet, l'homme distingué auquel nous accordons ce soir le couronnement de son travail, est en quelque sorte de chez vous.

Ancien élève de votre superbe école des Beaux arts, il a gardé toujours la main un peu française, l'œil un peu parisien.

Ainsi, en célébrant aujourd'hui sa vie, son art et ses triomphes, nous offrons au même temps, de même coup, nos hommages à l'école de son origine.

Sir John Burnet's Reply

MR. PRESIDENT, LADIES AND GENTLEMEN,—

As exclusively a practising architect, whose life has been spent in meeting the responsibilities of the profession as they appeared to him, I feel peculiarly unfitted to do justice to the position in which, through your kindness, I now find myself. I am deeply conscious of the honour to which you, my fellow-members of the Institute, have elected me, and profoundly sensible of the distinction conferred upon me by His Most Gracious Majesty the King in approving your choice. But I fear, Mr. President, in the all too complimentary remarks which you have made regarding my work, tempted perhaps by that splendid command of language which we all admire and wish we possessed, you attribute to my work qualities of which I was never conscious.

Simple as architecture was at the beginning of my practice, now municipalities with a new realisation of their responsibilities aspire to the healthy housing of the working classes. Curative establishments are as numerous as they are complex, and merchants and manufacturers are housing their great and ever-changing organisations with a new responsibility towards their numerous employees.

Thus, from being a simple problem, it has become a complicated one.

If it is true that an architect is here to serve his day and generation—and I think he is, and that it is at once his duty and his pleasure—what qualities must he not possess if he is to master all his clients' requirements and produce a building efficient for its purpose, suitable for its site, and so simple in its conception that it appears a perfect harmony, created without effort, a simple and beautiful monument to the integrity of purpose of the generation in which it was built ! There is no spurious originality in such work, no conscious individuality on the part of the designer. Our late colleague, Mr. Ernest Newton, speaking on architectural education, referred to his belief that there is all the difference in the world between the acquisition of knowledge of the art of architecture and the ability to apply that knowledge to the varied purposes of the day, and urged that the power of applying one's knowledge will best be obtained by the young architects serving the older and more experienced men of the day. I cordially agree with him, and believe that, as the work becomes more complicated, the truth of his remarks will become more obvious.

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During my long practice I have had many and varied opportunities, each seeming to be instinct with the life and thought of the day, and I have done my best to give each and all architectural expression compatible with its purpose, and that with such measure of artistic feeling as it was in my power to give. I have been favoured with the companionship of clients each keen on the purpose he had in view in building ; with the enthusiastic and sympathetic assistance of my brother artists, sculptors and painters ; and, in the execution of the work

loyal sympathy I doubt if the work you have so generously approved could have been done.

I again thank you, Mr. President, and through you, my brother architects, for the great honour you have paid me in adding my name to the list of Royal Gold Medallists, containing as it does the names of so many illustrious men, and you, I know, will understand me when I say that you could not pay me a greater compliment than to place me on a list bearing the name of my professor and lifelong friend, Jean Louis Pascal.



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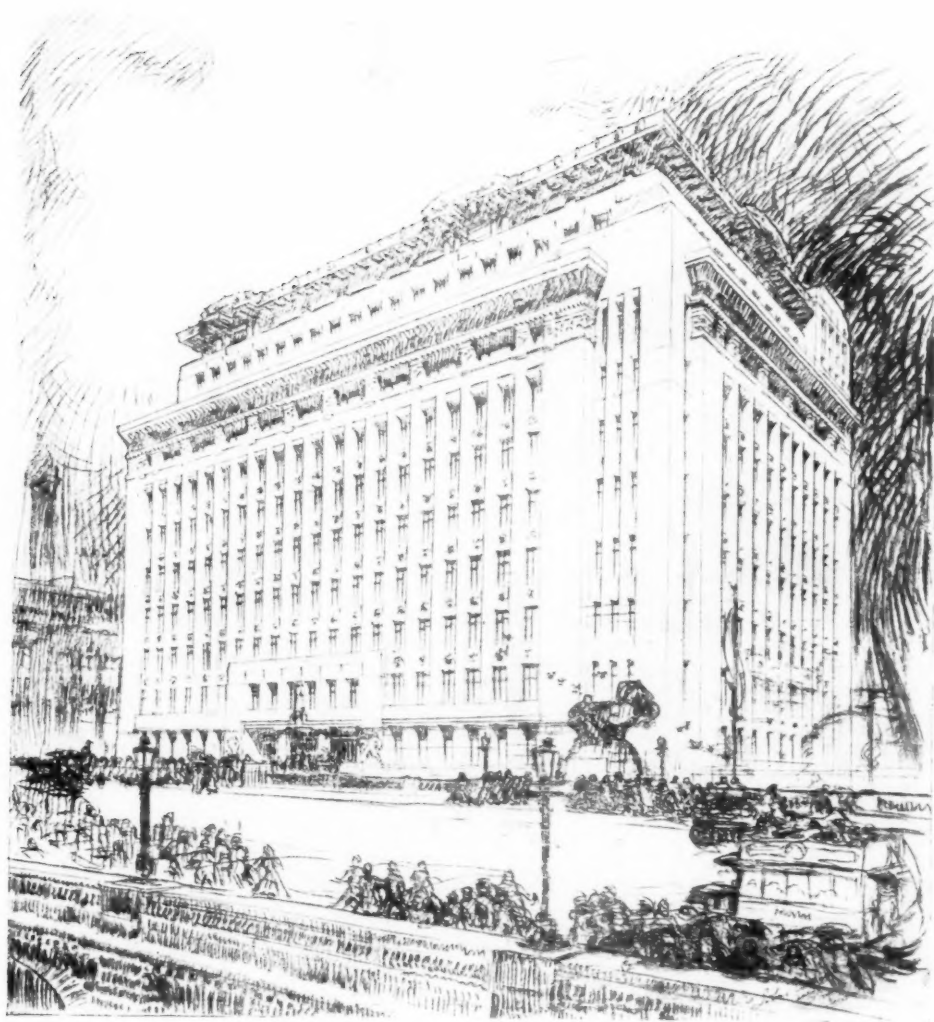
generally, with skilled craftsmen whose devotion, each in his own craft, went beyond payment. Could any architect desire more ? Is it astonishing that he enjoys his practice ; that he finds it difficult to do anything else than constantly, by travel and study, to make and keep himself equal to such work ?

Before I sit down I feel I must express my deep sense of indebtedness to all those who have been my assistants, many of them now in practice in different parts of the world, three being now my partners. Without their enthusiastic assistance and

M. J. GODEFROY, Vice-President of the Franco-British Union, said : Après des années si mouvementées, au cours desquelles nous avons écrit quelques grandes pages de l'Histoire ensemble, nous voici réunis tous, une fois de plus, dans la belle capitale de l'hospitalière Angleterre.

Permettez-moi de vous exprimer tout le plaisir que j'éprouve personnellement ; ainsi, je suis bien certain que je traduirai les sentiments intimes de tous mes compatriotes qui sont ici et vous imaginerez mieux encore les regrets de ceux qui sont absents.

Comme j'ai déjà eu l'honneur de vous le dire à notre arrivée, si nous ne sommes pas plus nombreux, c'est



ADELAIDE HOUSE, LONDON BRIDGE

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qu'un grand nombre d'entre nous sont occupés par les travaux de reconstruction de nos régions dévastées; ceux-là continuent à leur manière de faire campagne; car, hélas! vous le savez, toutes les tribulations de la guerre n'ont pas été finies pour tous les Français quand s'est levé le jour lumineux de l'armistice.

Avec quel plaisir renouvelé nous venons vous visiter, chers amis anglais, vous qui êtes les plus hospitaliers des hommes, vous qui avez l'hospitalité si franche, si cordiale; et quand on vous a vus chez vous, dans votre intimité, dans votre *home* où vous semblez avoir disposé toutes choses pour le bonheur honnête et paisible, il nous semble qu'à vous fréquenter nous nous complétons en votre compagnie.

C'est que nous savons bien ce qui nous manque: un peu de votre esprit pratique, si aimable, qui vous rend plus facile la vie aussi bien dans le plus somptueux des palais que dans la plus humble demeure. Il n'est pas jusqu'à vos campagnes dont les paysages mêmes semblent ordonnés pour le repos de l'esprit, qui ne donnent une leçon de calme, d'ordre; et rien qu'à voir vos charmants cottages on aspire au bien-être et à l'existence heureuse.

Comme nous devrions, nous Français, vous visiter plus souvent! Mais il faut espérer que nous allons devenir moins casaniers, à mesure que les plus hautes montagnes sembleront davantage des mottes de terre qu'on aura presque l'air d'enjambrer et que les plus larges mers ne seront plus guère que des ruisseaux qu'on aura l'illusion de sauter.

Que de beautés nous avons encore à découvrir chez vous! A chaque visite nous faisons connaissance avec de nouvelles. Rien que vos superbes collections valent plusieurs voyages! Vous, vous n'ignorez rien des nôtres pas plus que vous n'ignorez notre belle langue dans laquelle je dois vous parler aujourd'hui puisque je ne connais pas la vôtre. Mais, je le regrette, car je sais qu'elle est celle d'admirables poètes, celle dans laquelle votre Shakespeare atteignit aux plus hauts sommets du génie; celle de quelques uns des plus beaux lyriques de tous les temps.

Tout cela vous dit assez, je crois, que nous ne nous fréquenterons jamais trop. Je le pensais avant la guerre. Comment ne le penserions nous pas tous, depuis que le

sang versé ensemble a créé entre nous d'indissolubles liens.

At the conclusion of his speech, M. Godefroy referred to Sir John Burnet's training in Pascal's atelier, which he said wrought another link in the chain of association between the two countries.

M. G. Legros, the President of the Société des Architectes diplômés par le Gouvernement, also addressed the meeting.

Sir John Burnet, the son of John Burnet, one of Glasgow's foremost architects, was born in 1857. He obtained his professional education at the Ecole des Beaux Arts under the professorship of the late Jean Louis Pascal: and began his architectural career in the office of his father in Glasgow.

Sir John is an Associate of the Royal Academy and a Royal Scottish Academician. He holds an Honorary LL.D. degree of Glasgow University. He is a Fellow of the Royal Society of Edinburgh and of the Society of Architects (Scot.); a Corresponding Member of the Institute of France, of the Société Central des Architectes Français, and of the American Institute of Architects. He holds a Bronze Medal from the Salon for the King Edward VII Galleries, British Museum Extension; and a Gold Medal (1922) from the Salon for the exhibition of various works, notably that of Adelaide House, London Bridge (now in course of erection).

LIST OF SIR JOHN'S PRINCIPAL WORKS.

King Edward VII Galleries, British Museum Extension; Institute of Chemistry, Russell Square; Kodak Building, Kingsway; General Accident Assurance Company's Building, Aldwych; Selfridge Extension; Adelaide House, London Bridge (in course of erection); Second Church of Christ Scientist, Sunday Schools and Office Buildings, London (just completed); Scheme for the Lay-out of the Sea Front, Ramsgate (East Cliff Gardens); redecoration of the Merchant Taylor Company's Hall, London; Institute of Fine Arts, Glasgow; The Athenæum, Glasgow; head office of the Clyde Navigation Trust, Glasgow; extensions to the Western Infirmary, Glasgow; extensions to the University, Glasgow, Students' Union, etc.; Royal Hospital for Sick Children; head offices of the Union Bank of Scotland, Glasgow; the Barony Church, Glasgow; Elder Library, Govan; Atlantic and Waterloo Chambers, Glasgow; Charing Cross Mansions, Glasgow; Arbroath Parish Church; Arran Church; Gardner Memorial Church, Brechin; Alloa Baths, Alloa; Wallace Scott and Co.'s Warehouse, Cathcart; premises for R. W. Forsyth, Princes Street, Edinburgh; Edinburgh International Exhibition, 1886; The Alhambra, Glasgow. Sir John is also the architect for the War Cemeteries in Gallipoli and Palestine.



From an engraving by Wenceslaus Hollar

EDINBURGH

The R.I.B.A. Conference in Edinburgh

The Annual Conference of the Royal Institute of British Architects, with which was combined the Annual Convention of the Incorporation of Architects in Scotland, was opened in the City Chambers, Edinburgh, on Thursday, 14 June. Mr. J. Alfred Gotch, F.S.A., President-elect of the R.I.B.A., occupied the chair in the absence of the President, Mr. Paul Waterhouse, and the members of the conference numbered nearly 300. A civic welcome was extended to the members.

Lord Provost HUTCHISON: It is a very great pleasure for me to meet the members of this conference this morning, and on behalf of the Corporation to extend to you all a very cordial welcome to the ancient capital of Scotland. Those of you who are visiting Edinburgh for the first time will, I think, find it has a charm and interest for you. You will discover in the old town and in the new town many beautiful examples of ancient and modern architecture. I understand that the Royal Institute of British Architects and the Incorporation of Architects in Scotland have combined on this occasion to hold their annual conference here, and we are very glad you have chosen Edinburgh as your meeting place. The profession of architecture is one which is of great importance to every community, and in Edinburgh it holds a worthy and honoured place. In these days, particularly when the housing question is of such pressing importance, it is essential to have the benefit of the experience, knowledge, and advice of architects in dealing with the many problems and difficulties with which we are faced, and it is gratifying to know that that assistance is always willingly forthcoming. The Royal Institute of British Architects, I believe, is a somewhat older body than the Scottish Incorporation, which received its Charter last year, and which owed its initiation in 1916 to the late Sir Rowand Anderson, through whose

liberality it has been so well endowed. Your organisations, I understand, have been formed for the purpose of uniting in fellowship the architects of the country for the promotion of the æsthetic, scientific and practical efficiency of your profession; to promote and facilitate the acquirement of knowledge of the various crafts, arts, and sciences connected with architecture, and to foster the study of national architecture and encourage its development. With these objects and aims before them British architects can look forward with every confidence to the future. Again, let me say we very heartily welcome you here to-day and trust that your conference will have useful and fruitful results.

The CHAIRMAN (Mr. J. Alfred Gotch): On behalf not only of the architects of Great Britain, but of the whole of the British Empire, I beg to thank you, sir, for the very kind reception which you have given us. I say of the whole British Empire because the architects of Australia have formally appointed Major Corlette to represent them in England, and he is here on their behalf to-day—an interesting reminder that the Royal Institute of British Architects and its allied societies cover practically the whole of the inhabitable globe. You have referred to the City of Edinburgh as being of great interest. I am sure those who know it, and those who do not, will soon ascertain that it is one of the most romantic cities in Great Britain—I am not certain that it is not one of the most charming and impressive cities in the whole of Europe. On behalf of the architects I have to thank you for your kind welcome.

The Lord Provost and several of the City Magistrates who accompanied his Lordship having withdrawn,

The CHAIRMAN said: I understand that the President (Mr. Waterhouse) has been detained and cannot be present to-day. In a deputy capacity, therefore, I have great pleasure in calling upon Mr. Marwick to read his paper.

“EDINBURGH : ITS RISE AND PROGRESS”

BY T. P. MARWICK [F.].

PRELIMINARY.

MR. PRESIDENT, LADIES AND GENTLEMEN,—I have been asked to read a short descriptive paper on “Edinburgh : Its Rise and Progress,” as a local Fellow of the Royal Institute, although I represented to the Secretary here that few cities could be so well known, or have had expended upon them such a wealth of literary effort. For those visitors, however, still unacquainted with it, I shall endeavour to focus in the thirty minutes allotted to me the leading factors which give to this picturesquely interesting and historically fascinating old capital of Scotland its place in the affections of the world.

OLD EDINBURGH.

The city is readily separable into two parts, the “Old” and the “New.” Let us look at “Old Edinburgh” first. One never hears the words but they seem to ring a call-bell in the brain. They are woven into the very texture of our lives. Instantaneously, as by the quick turn of a kaleidoscope, we visualise a series of pictures of our ancient burgh all down the centuries. The whole scenic development flickers on our mental screen like the film of a cinematograph. To residents it is a subject of perennial interest, possesses an extraordinary fascination, and has a subtle magnetism emanating from their knowledge of its historical development, their daily contact with its many picturesque features, and their natural pride in its prestige as the ancient capital of their beloved country.

On arrival in the city the eye naturally gravitates towards the castle, as no doubt did that of the military Roman. This rocky crest at once attracts attention as a natural fortress of great strength, and capable of ready defence. Its existence, coupled with the configuration of the land around it—moulded by Nature in the distant ages of the prehistoric past—determined its destiny. Around this coign of vantage clustered the huts of our forefathers, while the natural ridge, about a mile in length, which stretched eastwards, until it reached the valley 300 feet below in which the monastery of Holyrood ultimately came to be built, was the inevitable line of its growth. You are sitting now about the centre of this ridge which has been called the backbone of the old city. The beginning took the form of wooden, straw-thatched houses, which were destroyed and replaced time and again in the constant ebb and flow of the struggle for possession and mastery, until the light of history dispelled the veil of mystery which enshrouded it. We need not count the work of the Romans in the first five centuries of our era, nor that of the Anglo-Saxons in the next. These years may be epitomised as alternating periods of peace and war

with the castle as the object of possession, until in 1020 it became the residence of royalty on the cession of the Lothians to the Scots. In 1093 Queen Margaret, wife of Malcolm III, died at the Castle, and you will to-day see her little chapel with some of its Norman architectural features still intact.

About 1128 King David I founded the Abbey of Holyrood at the foot of the slope on the site of a pre-existing Celtic church.

In 1174 the castle was surrendered to Henry II. In 1186 it was restored to the Scots on the marriage of the king to an English princess. In 1230 Alexander II, who also married an English princess, resided in the castle and founded the Monastery of Blackfriars. In 1291 the town and castle were surrendered to Edward I. In 1327 Robert I held a parliament at Holyrood. In 1332 Edward III plundered the city, and, indeed, it may be said that Edinburgh was a veritable cockpit wherein the two nations were constantly in the ebb and flow of war, with attacks, defeats, victories, surrenders, and bloody battlings too numerous to chronicle.

When Froissart, the French traveller, visited Edinburgh in 1364, he described it as containing about 400 houses and 2,000 of a population. He calls it the “Paris of Scotland.” In the year 1385, when Richard II made an unwelcome call, he amused himself by reducing this rather meagre town to ashes. In 1544 the same thing occurred under the Earl of Hertford. Those were the little amenities which were being constantly exchanged between England and Scotland before the days of British Architects’ Conferences.

In 1437 Edinburgh became the capital of Scotland and James II was crowned there, and by Charter dated at Stirling in 1450 conferred the privilege “to fosse, bulwark, wall, tour, turate, and utherwais to strengthen the burgh, in what manner of wise or degre that beis maist spectefulle to the provost, etc., of Edinburgh who lived at the time in dreed of the evil and skaith of our enemies of England.”

In 1460 this defensive wall was built. Only two sides of the city required to be enclosed, as the Castle, and the North Loch which filled the valley in which is now the Railway Station—a convenient place for the ducking and drowning of witches—protected the other two. Indeed, the whole length of walling was only 1,660 yards, and the total area enclosed was but 55 acres, or one-twelfth part of a square mile. After Flodden in 1513 the area was extended by building a new wall at the base of the escarpment, for the protection of the houses which had been erected outside the original wall of circumvallation. Another extension was made in 1620. Still at the time of the Union with England in 1707 the

"EDINBURGH: ITS RISE AND PROGRESS"

enlarged area was only 117 acres. I had a rather unique opportunity some years ago of measuring a portion of this wall and found it to be 18 feet high and 5 feet thick. Although long since destroyed there had been a parapet on the top, for it is so stated in a document of the time, and it is there given as 6 feet high and 2 feet thick, with embrasures for cannon. The total height of the wall was therefore about 24 feet. It formed a good protection in such times, and, indeed, was described as "of vast strength." But strength is a relative term. The weapons of to-day would have made it crumble to pieces as rapidly as those of Jericho did on much less provocation.

It has been found from an examination of early charters that most of the sites on the main street were only about 25 to 30 feet in width. The original buildings had back gardens stretching down the slope to the loch on one side, and to the valley of the Cowgate on the other.

As congestion increased within the restricted limits of this mediæval walled city, each owner rebuilt the front tenement, and formed an opening or access archway and pend through it. A narrow open close, a few feet in width, was then continued for the remainder of the length down the steep hillside. These closes were private property, and were margined with lofty buildings in long parallel ranges, with quaint corbellings, timber projections, dormer windows, outside stairs, and piazzas all in picturesque combination. In the houses resided aristocratic denizens and legal luminaries arranged in six, seven, eight or nine horizontal layers one above the other. Sanitation was an unknown science. While "the far away and long ago" has a strange fascination, we may all agree with Anatole France when he says that "the charms of the past exist only in our dreams!" There was no privacy. You could shake hands with your neighbours across the close, for successive projections nearly met each other and left visible but a streak of sky. You could readily sense his dinner menu, hear his wife expatiate to him on matters of domesticity and teapot humdrum, or listen to the pleadings of his progeny when Solomon's apophthegm as to the chastening of a son was being given practical demonstration. No more insanitary arrangement could have been invented, the one and only merit being that the closes ran north and south and were swept by the prevalent winds. In the closes of the Canongate alone, as late as 1769, there were living two dukes, eighteen earls and countesses, fourteen lords, thirteen baronets and a host of eminent men.

I have measured and ascertained that there were over ten miles of these closes on the main thoroughfare, while the gradients showed the difference in level between one end and the other to be sometimes as much as 100 feet. There were 294 closes exclusive of those in the suburbs.

The city continued to grow in this restricted area, and

these lofty structures became the prototype of our tenebmental development. It was the beginning of intensive and extensive exploitation of central land areas. Here was a great congeries of buildings filled with people all huddled together for mutual protection. It was no doubt vastly picturesque and interesting, with its turnpike stairs, its turrets, its quaint mottoes, its pious inscriptions, its coats of arms, its crow-stepped gables, and its panelled walls. But to-day where they still exist they spell of the peril of disease. There are fifty thousand souls resident in the two central wards of St. Giles's and Canongate alone. In one common stair quite recently there were forty-six separate houses. Incidentally I may mention that there are 150 licensed shops in these two wards, or one-fourth of the whole number in the city. Misery and death lurk in such an environment which is so far behind present-day ideals. Infantile mortality in a modern garden town like Letchworth is at the rate of 30 per 1,000. In these wards it is 134, or $4\frac{1}{2}$ times greater. One's heart bleeds for the children reared in such surroundings. The death rate is double what it is in the suburban districts. The density of the population in one ward is about 100 per acre as compared with an average of 13 for the whole city, which shows that there is a relationship between the death rate and overcrowding. As the Italians say, "Where the sun does not go the doctor goes."

Edinburgh has at the present time a very enlightened Corporation, and they are making strenuous efforts to improve matters. You can understand, with a city built for defensive purposes on the lines described, how slow, how difficult, and how expensive a matter this must be. Care is being exercised to preserve our historical structures. Too many have been destroyed in the past, but there is now a strong desire to have what is left preserved and restored to healthy habitability, handled reverently, and with sympathetic care. They do not desire to make a fetish of antiquity, or to cultivate a spurious veneration for what is old simply because it is old, but they have no sympathy, I am sure, with vandalism carried out in small systematic doses until no shred of the original is left. The history of a nation is written in its buildings. They record with unerring precision its age and fateful past. They are the milestones on the highway of civilisation and progress.

NEW EDINBURGH.

Let us now look at "New Edinburgh." Up to about 1750 the city was confined to the district lying between the Castle and Holyrood. With the Union there came a slow-growing desire for betterment. The citizens determined to burst the cincture which girded in these congested masses of people.

In 1763 the North Loch was drained, and the North Bridge was commenced which was to give access to the fertile fields towards the estuary of the Forth. It col-

lapsed in 1769 during construction, but in 1772 it was finally completed and opened. It was then decided to hold a competition, with the view of endeavouring to obtain the best lay-out for the ground to be built upon, and that by Mr. James Craig was selected and adopted in 1767. His scheme embraced the whole length of Princes Street from east to west, and from Princes Street to Queen Street Gardens from south to north. George III was much interested in the scheme, hence the names of George Street, Charlotte Square (after his Consort), and Princes Street after his heir. The plan consisted of a series of parallelograms, long vistas margined by uniform rows of houses, with gardens and squares. As showing the appreciation of the people at that time the successful architect was honoured by being presented with a gold medal and the freedom of the city. One would like to see to-day similar public appreciation when good work is done by members of a noble profession.

By the year 1800 the whole scheme had been completed. The area north of Queen Street Gardens from Bellevue Crescent to India Street was then undertaken in 1806, all plans being matured by agreement between the various owners and feuars. This method was unfortunately abandoned at a later date and individual landowners developed their holdings independently. Co-ordination is essential if any satisfactory scheme is to be evolved for the development of a city.

In 1816 Mr. W. H. Playfair, the architect, prepared a plan for the lay-out of ground towards Leith Walk and Easter Road, but only London Road, Hillside Crescent, Royal, Regent and Carlton Terraces were ever executed. The remarkable thing about these schemes was the entire absence of areas for public works. It appeared as if all the inhabitants of Edinburgh were to be residents of means living in large self-contained mansions.

In 1768 Craig had little to inspire him in the way of town planning on spacial lines. It is true that Sir Christopher Wren in 1666, one hundred years before, had designed a lay-out for the City of London immediately after the Great Fire. It was a magnificent plan comprising the area within the Walls from Ludgate to Aldgate, and Billingsgate to Cripplegate, but it failed to materialise owing to the cupidity of the owners. If it had been carried out it would have proved an immeasurable boon and saved millions of money. Wren's plan, again, was no doubt inspired by that of his predecessor, Inigo Jones, at Lincoln's Inn Fields, and possibly by Bernini's plan of the approaches to St. Peter's at Rome. Edinburgh, however, was undoubtedly a pioneer in Town Planning on a large scale, although Bath had "Queen's Square" in 1729 and the "Circus" in 1764. It has been called "the greatest scheme of the age," but, of course, as we all know, many ancient cities were specially planned. The plans carried out combined dignity, wide roadways, ordered buildings, long vistas, and

tree-clad squares and terraces. Their practical realisation, no doubt, influenced the town-planning schemes of to-day.

I may note that Edinburgh Town Council is still faithful to past traditions. A Consultative Committee has been recently appointed to co-operate in the work of developing the city on right lines, to have its growth carefully and systematically regulated, to have faulty street planning prevented, and objects of historic interest preserved. There are two architects on this Committee. By and by one hopes there will also be an Advisory Fine Arts Committee such as exists in New York and other American cities, to influence the production of worthy buildings and to see that all the accessories of a beautiful city are created and maintained.

If you look at the Register House building, designed by Robert Adam, which is a gem in its way, and consider what efficient town planning in the eighteenth century could have done when land was practically available free, you can see what a splendid opportunity was lost for the creation of a fine Civic Centre. It was an irreparable error caused by lack of wise forethought.

I may explain that the English leasehold system does not obtain in Scotland. Building land is given off in lots by way of perpetual feu. The total ground rents obtained for the whole area first described in Princes Street was only equal to an average capital value of 4d. per square yard. Parts of this land now fetch £100 to £150 per square yard, or nine thousand times the price it was 150 years ago. This increment does not improve the financial position of the original landowner. It passes entirely from owner to owner of the property, and finds expression in the price obtained.

PUBLIC PARKS AND OPEN SPACES.

Coming now to public parks and open spaces in the city, I may say that the total area of these extends to 1,836 acres, or one acre for 229 souls. This includes Leith, which, previous to amalgamation, had only one acre to 1,148 souls. There will be further liberal allowances in the future, but at present there are 36 public parks, 73 tennis courts, 29 bowling greens, 4 golf courses, 10 short hole and putting courses, 68 football pitches, 9 cricket pitches, and 15 children's playgrounds and gymnasia. The American Park and Outdoor Association, in its report for 1901, suggested as an ideal one acre to 200 inhabitants, while other authorities propose one acre for 250. Edinburgh, having already one acre for 229 inhabitants, occupies a very favourable position.

The citizens are fully alive to the necessity for a spacious environment, an amplitude of open areas for parks and recreative purposes as tending towards a gradual and sustained improvement in the physique of young and old. As a community our desire is to reach out towards a higher standard of civic life.

"EDINBURGH: ITS RISE AND PROGRESS"

STATISTICS.

As to statistics, I have mentioned that in the year 1300 the population was 1,200, and in 1364, 2,000. By the year 1800 it had increased to 67,000, by 1851 to 160,000, while to-day it is 420,000, or 210 times larger than in Froissart's time. You have heard that the total area enclosed within the fortified wall was originally 55 acres. To-day it is 32,401 acres, or 50½ square miles—that is, 589 times larger. It is much larger than Glasgow, Liverpool, Manchester, Leeds, Sheffield, or any other provincial city except Birmingham.

Since the recent extension there are now only three administrative authorities in the city in place of fifteen, and two rating authorities in place of ten.

The gross yearly rental value is just about five millions, while the assessable rental is £4,382,955. The total rates on owner and occupier combined amount to 8s. 6d. per pound, but it may be explained that the burgh rate is chargeable on the gross rent, and not on the net as in England. The municipal debt is only six millions, whereas Leeds, Sheffield, and Bristol, with somewhat similar populations, have respectively twelve, ten and nine millions. The debt of Manchester is twenty-two, Birmingham eighteen, Glasgow fifteen, and Liverpool ten millions.

There are 95,224 occupied houses which give an average of 4.41 persons for each, while 4.7 per cent. of the population live in one-roomed houses and 55 per cent. in two- and three-roomed houses. While the density is 13 per acre, even after absorbing Leith, which had a density of 72 per acre, I may note that the average of twenty of the largest towns in the country is 17.3. Leeds has a density of 17.23, Birmingham 19.27, Stoke-on-Trent 21.05, Aberdeen 25, Manchester 32.92, Dundee 28, Liverpool 35.5.

INDUSTRIES AND MANUFACTURES.

Edinburgh is a university town and a great educational centre. It is the seat of the Supreme Courts of Law. It is the home of many industries, and is in the vicinity of a network of coalfields and the principal shale areas of the country. It was one of the first places to possess a printing press. In 1507 one was set up in the Cowgate, and a copy of the Bible at that time cost £4 13s. 4d. All persons worth £500 were compelled to buy a copy or pay a fine of £5. About 1750 the city became noted as a printing centre, and obtained a world-wide reputation which it still maintains. There are quite a number of breweries, which are dependent upon a constant supply of permanently hard water of a peculiar quality obtained from the strata of the Upper Old Red Sandstone as developed in the southern district of the city. Paper manufacturing is a considerable industry, the raw material being landed at Leith—linen rags from Central Europe, esparto grass from North Africa, and wood pulp from

Scandinavia. A large amount of milling and baking is done, while the city is surrounded by a rich agricultural neighbourhood. In commerce and finance 40,000 people are engaged, in shipbuilding and engineering 20,000, in the professions 16,000, in printing and papermaking 12,000, in the building trades 8,000, in rubber manufacture 6,000, while large numbers are employed in the manufacture of food and tobacco.

Edinburgh is one of the largest distributing centres of electrical power, and that should prove a powerful attraction for new industries. There is no doubt that large works in a city tend to bring others, while the bigger the city the more powerful the influence it exerts over industries. Edinburgh may become a great seaport, for it possesses 333 acres of docks at Leith, and has a magnificent seaboard ten miles long. We see visions that in the near future it will be a throbbing hive of industry, and a centre of great commercial importance.

ARCHITECTURE.

As to the architecture of Edinburgh there is no need to refer further to what is interesting or worthy in our old buildings. The architectural features of the Old Town have been sufficiently indicated. The towers, turnpike stairs and crow-stepped gables and other picturesque features were chiefly influenced by French examples, the result of the close association between Scotland and France in the Middle Ages.

Of late eighteenth century work it may be noted that Robert Adam designed the University, the Register House and Charlotte Square. Charlotte Square is a good example of Adam's work. It is all his design except the church on the west side, which is by Sir Robert Reid, and much inferior. Thomas Hamilton designed our magnificent High School, and W. H. Playfair the classical Galleries in Princes Street. Other interesting structures, in addition to those to be examined to-day, are Craigmillar Castle, Greyfriars Church, McEwan Hall, St. Giles's Cathedral, Thistle Chapel, George Heriot's Hospital, Stewart's College, Fettes College, Scott Monument, and some fairly good modern buildings, but not so good as they might be. The Dean Bridge is a fine design by Telford. Ruskin said: "Of all the cities in the British Isles Edinburgh is the one which presents most advantages for the display of a noble building, and which, on the other hand, sustains most injury in the erection of a commonplace or unworthy one."

DISTINGUISHED INHABITANTS.

Of the great people of the past who were natives of Edinburgh, have lived in, or been closely associated with it at some period of their lives, I need scarcely speak, as their names are familiar to everyone—Mary Queen of Scots, Charles Edward Stuart, John Knox, Sir Walter Scott, Robert Louis Stevenson, Carlyle,

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Adam Smith, David Hume, Allan Ramsay, Dr. John Brown, Robert Fergusson, Jeffrey, Brougham, Cockburn, Drummond of Hawthornden, Mrs. Oliphant, Smollett, Oliver Goldsmith, Shelley, "Christopher North," Sir David Baird, the hero of Seringapatam, General Dundas, who captured Cape Town, Admiral Duncan, the hero of Camperdown, Burns, De Quincey, Boswell, Sir James Simpson, many eminent artists, and endless others.

CONCLUSION.

I have now shortly and hurriedly given you a little sketch of the fundamental facts about this city. Its topography, its bourgeoning and blossoming down the centuries, its historical development, its architecture, statistics, open spaces, industries and manufactures, and the procession of notabilities who knew it for the brief years which constituted their lives before passing into the Great Silence. Generation after generation has arisen to come under the spell of its glamour and magic witchery. It is a city which attracts and lures everyone from far and near, nor do they ever weary of hearing again, and yet again, its old, old story, for it is a subject somewhat akin to human love and human frailty, ever old yet ever new. One would love to linger longer on a subject which touches so intimately our sentiment and imagination.

tion. The old buildings, though voiceless, seem still to speak to us of the long buried past, and to whisper in our ears the tales of other times and other manners.

I ask you to go out into the fair fields which environ the city, and, from a lofty view-point, look towards it when it is bathed in the golden haze of the noonday sun, lustrous, burnished, radiant. There it lies between the foothills of the Pentlands and the sea in all its picturesque fascination, surrounded by the everlasting hills, those silent sentinels which brood over it through the centuries like a mother over her children. Mark its towers and its spires piercing the skies, and if you come to it as a stranger in a mood of peace and restfulness you may say, "This is a Dream-City," and you are not, as you may be in the Orient, disillusioned on closer acquaintance. You will not deny that it is a city redolent of charm and beauty: a city of castle, sea and distant mountains; a royal and incomparable city; one of the grand and glorious cities of the world; a city full-charged with the pathos and tragedy of the past; no mean city, but a city one could live and die for; a city set on a hill which cannot be hid; a city which comes whispering her enchantment to all those who love her, a city—

"Piled deep and massy, close and high,
Mine own romantic town!"

THE PLACE OF ARCHITECTURE IN CITY DEVELOPMENT

BY H. V. LANCHESTER [F.], PRESIDENT OF THE TOWN PLANNING INSTITUTE

In considering the modern city we must think first of city development and then of architecture, architecture basing itself on purpose and being clearly subject to the form development takes. Thus, in order to reach the architectural aspect we must have a clear picture in our minds of the general type of organisation we desire. The first need is that our towns should be orderly and efficient, meeting all requirements of economic production and sane living. These are basic requirements which will in the main dictate the type of design.

Before attempting to formulate these it would be serviceable to glance back at the problems of past ages and see how far these were solved in their own times, and note more particularly the failures that resulted from the difficulty of adapting established organisations to changed conditions, such difficulties being the main factor in our problems to-day.

Primitive building was circular in form, and we still meet with hut villages that represent the more general type of communal group in primitive times. Not only in this case but in others, such as cave and lake dwellings, there yet remain examples of the earlier experiments of man in grouped housing. These possess an

interest as showing the various expedients to which man had recourse in his battle with nature.

The circular hut is the most economical form for a single-chamber dwelling. The cave was an obvious expedient where it was easier to remove material than to build, while the lake dwelling type had marked advantages in affording protection from wild beasts, and in the case of river banks, or tidal waters, in giving an easy way for disposing of refuse.

These types still persist among primitive peoples, but they are no longer possible when the organisation becomes more complex. The circular form is unsuitable for a building of more than one room, and the cave for more than two or three, apart from the rarity of a site suited to a rock-cut city in any appropriate location; while the aquatic village grown to any size is no longer convenient or sanitary.

Rectangular building is the inevitable solution of communal needs, and as a consequence of this all the earlier forms of planned towns are on rectangular lines. Egyptian, Greek, Roman and mediæval examples all illustrate this, and it is only where growth has been adventitious that we fail to find a large element of

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rectangularity. It is because the latter was the case in so large a proportion of mediaeval towns that they are typically irregular rather than regular, the main factors militating against the rectangle being the existing radial routes and irregularities of surface.

A passing reference should not be omitted to one of the more interesting factors in the development of the town plan—namely, the constantly increasing importance of the wheel. Early cities and early roads had but little wheeled traffic, and we find correspondingly little regard for gradients. During the last three centuries increasing consideration has been given to this factor, up to the culminating point of the railways, where gradient is of the first importance.

We may regard the primitive forms of city development as of two types, the organised and the opportunist, the plan of the latter dictated by site and by routes pre-selected for traffic and convenience. It would take too much time to go into the interesting study of the numerous conditions that have dictated the locations for towns and the influence of the defensive walls and the more elaborate fortifications of later times, which have been dealt with in such an illuminating way by Professor Geddes and others, so with the one remark that these have profoundly influenced the form of many of our cities we will pass on to the industrial age, to which we are indebted for the main obstacles to sound development at the present day, though the untrammelled railway activities of the latter part of this period have added serious complications. We can learn from the past how unwise it is to abandon features that at the moment may have seemed superfluous, but which change has restored to importance either for their original or some other purpose. Thus the neglect of our main roads on the advent of the railway has seriously hampered us in recent times. Again, many of our towns are unduly congested at the centre owing to the building up of old market places where the proprietors of temporary stalls managed to substitute permanent buildings. Somewhat similar procedure resulted in the loss of the Thames-side roadways in the city of London; the great ring road laid out in the eighteenth century from the City to Paddington, 150 feet wide between frontages, has suffered from extensive encroachments, and now we find the London squares endangered, two of these being on offer as building sites at the present moment.

Our difficulties in the reformation of the city are not solely, or even primarily, the mass of undesirable material we have to deal with, but the inheritance of habit and mentality that is imposed upon us. Man changes his attitude of mind only gradually, and we are still in large measure thinking in terms belonging to methods the results of which we simultaneously deplore. Our industrialists and economists, while admitting the need of remedial measures, are still

unable to accept those of a more drastically reconstructive character. Despite a general acceptance of the proverb, "Prevention is better than cure," any solution that hints at control of industrial liberty is still likely to meet with strenuous opposition, and the town planner is not as yet at the end of his battle for a more logical organisation in the future development of the city.

As without such organisation the art of architecture suffers from every possible handicap, I make no apology for putting this aspect in the forefront of my argument, and for claiming that it is the one most urgently in need of our attention. When we look around we shall find that there is no need to be discouraged and that we may not be so far from our goal after all.

Under the name of Zoning, not perhaps a very explicit one, although it has been generally adopted, we shall find that the control we seek is already, in most of its features, in operation in one important centre or another. In confirmation of this statement let me give you a few extracts from Mr. Pepler's paper at the Town Planning Institute last year.

"The first zone plan appears to have been that of Altona, in 1884, by Franz Adickes, the burgomaster who afterwards gave his name to the celebrated Lex Adickes of Frankfurt. Many other German towns followed this example. These zone plans form part of the Town Plan and govern heights, character, and density, the highest and most closely packed buildings being allowed in the centre, and more spacious planning being insisted upon in the outskirts. Both in Germany and America the zoning regulations apply to the whole town and are not subject to compensation to owners.

"In America, the city of Los Angeles appears to have established the first zoning ordinance in that country in 1909. Since that date more than thirty other cities have followed suit, and some forty more have schemes in course of preparation. The first zone ordinance of a comprehensive type was adopted in New York City, July 25th, 1916, and in 1920 the following report was made of its working: 'It may be said that the New York ordinance has city-wide approval. During practically three and one-half years of adoption there has been surprisingly little attempt to change it, while no actually significant changes have been made in the ordinance itself. It has been approved by practically all the important organised groups of the city, which is sufficient indication of its value and importance.'

"In England the first attempt at zoning was made in the Town Planning Act of 1909. It is worth while to quote the opening Town Planning Section (54 (1)): 'A Town Planning Scheme may be made in accordance with the provisions of this Part of this Act as respects any land which is in course of development or appears likely to be used for building purposes, with the general object of securing proper sanitary conditions, amenity,

and convenience in connection with the laying out and use of the land, and of any neighbouring lands.'

"An important distinction will be noticed between these powers and those exercised in America and Germany—namely, that our Act does not seem to cover the inclusion of whole towns in schemes but only the developing parts.

"The Canadian Town Planning Acts are largely based on ours, but draw no distinction between built-upon and unbuilt-upon lands, so that in the Canadian States which have adopted Town Planning whole towns can be included in schemes.

"The Birmingham Corporation began by prohibiting any dangerous, noxious or offensive trade to be carried on except on lands already so used or appropriated for the purpose; otherwise no specific factory area was set apart, but no factory or building other than a dwelling-house could be built anywhere in the town-planned area without the consent of the Corporation. In their last scheme, for the South Birmingham area, factories are allowed on certain areas by consent of the Corporation, without any advertisement being necessary; in other more residential areas, advertisement gives the residents the opportunity to appeal.

"The Manchester Corporation, in their scheme for the southern area, propose to set aside one portion of the area where any type of factory can be erected without the consent of the Corporation being required, except as to manner of erection, height, elevation and character of building. The Corporation can permit factories in other parts of the area, subject to certain restrictions."

The New York Zoning Ordinance is stated to have prevented vast depreciation in numerous districts, while it has effected numerous savings in values amounting to many millions of dollars; and the St. Louis Ordinance is also said to have resulted in a very noticeable stabilisation of values in several residential areas which, previous to the adoption of the zone ordinance, were declining or showing tendencies toward depreciation.

It seems to me only reasonable to claim that the preparation of schemes of zoning is the step now of the most importance in giving city development the direction that will make it the appropriate nursery for good architecture. We must all agree that one of the first conditions demanded is that buildings shall have appropriate sites and protection from an environment destructive to their effect. Though we may be able to admire a fine building, like a fine picture, wherever we find it, that is not architecture as it appeals to us from the civic point of view; we want the city to be fine, not to have to rake in the dustbin for some precious gem, and the only way to secure dignity and beauty throughout is to prepare the road for it by providing a general scheme which ensures consistency and order in all parts.

The architect will never underrate the value of tradition, which always affects the appreciation of beauty, but it is important to distinguish between those traditions which are helpful and the others that are the reverse. This can only be done by a most intimate study of city life and of the city dweller, a study that embraces not only the economic development, such as how the place earns its living and supplies its needs, but also its social and cultural ideals—what its inhabitants demand to get with the margin beyond their working time and living wage. Not until we have grasped the demands which come under these heads are we entitled to claim the right to indicate the material form in which the city shall express itself. Development is not merely extension, it qualifies that which already exists, and it is only by comprehending the conditions and tendencies of a community that we can ensure the soundness of proposals for revision and reconstruction, so that these shall retain all that is of value and only sweep away what has become detrimental to the social organism.

In a well organised town nothing need offend; some parts would be more interesting than others, but as there is never anything distasteful where structure or mechanism perfectly subserves its object, a town in which everything complied with such a law would be basically sound. If over and above this its non-material demands were met expressively it might be considered as perfect. You may think I have carried this attempt at simplification too far, as it is difficult to picture any city reduced to these terms. In all those with which we are familiar there are so many complexities to be reconciled, and so many demands for compromise, that it will not be amiss to cast our eyes over some of the matters that require attention if future development is to lead us towards the city of architectural beauty.

Architecture, considering that its expression takes so abstract a form, has been fortunate in finding even a limited number of enthusiastic votaries outside its exponents. The appeal for it can never be made directly to the community as a whole as a "fine art," for in the general view it is but rarely divorced from its basis of utility, and thus architecture can only be comprehended through the familiar aspects of building.

Architecture has long ceased to be in itself a popular art, by no means entirely the fault of the public; indeed, considering the advantages it has in the fact that buildings are always to be seen and cannot be evaded, it would look as if the architect ought to have been more easily able to retain popular esteem than any other artist, and he would have done so had he not been tempted to regard his work as on a plane above the life of the normal man, instead of something solidly based on this and developing out of it.

Design is an imaginative effort governed by a number

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of factors such as site, orientation, hygiene, economy, durability and proportion, the last including the relative importance of the components of a building as the basis of the composition; and though the traditions of the past define what is regarded as "good taste" and may not be ignored, we cannot accept their domination of design to an extent almost excluding the other factors. Owing to this attitude architecture became academic and in disrepute with men of direct and logical mind, who preferred any kind of building provided it met their requirements. This would have been healthy discipline had it been thorough, but there remained a sort of vague notion that a building ought to be "architected," and from this developed the "practical designer" who, without any sense of form and expression, slavered the buildings over with sham architecture and produced so much of the work that shocks us in our towns to-day. He was naturally vulnerable to the vagaries of fashion, and if we wander through our streets and suburbs we see these represented in various forms, all distorted and abounding in affectations.

With this lesson of past failures before us it will readily be accepted as of the first importance that the general character of the various forms of city development should be determined before attempting to visualise them architecturally. When speaking of this general character it must not be regarded as going beyond the allocations and organisations essential to economic requirements and the well-being of the citizens, for on passing this point the architectural aspect comes in as giving form to the planning and structures designed to meet these needs. Thus the provision of roads suitable in alignment and capacity to the buildings they serve is just as much an architectural question as the internal planning of a building; architects have been too apt to look upon their craft as limited to building works only, whereas it extends to all questions that affect the appearance of groups of buildings and their relation to the surroundings, so that the architect should be prepared to deal with every problem that arises in civic development, and even if some of these are not submitted to him for final decision he should at any rate be in a position to exercise a critical influence from his point of view. The form these problems may take will be varied almost to infinity, so that only one or two illustrative examples can be referred to at the moment. In dealing with development the first question that arises will be the allocation of areas for manufacturing, residential and other purposes, as already referred to in the notes on Zoning, but closely linked up with this are the arrangements for transport and transit, in regard to which the architect has hitherto had very little to say. The result of this has been that these have generally been conceived in forms quite unnecessarily destructive to

amenity and beauty. The earlier railway stations were designed by architects, but as this practice was soon abandoned we find as a consequence that in few places can we do other than deplore the forms that railway developments have taken. At the present moment there is a recognition of this failure, and a distinct demand that projected extensions shall be less destructive to the general amenity, so we may take courage and endeavour to prove that we can in the future give valuable service in this direction.

As regards housing also the architect has now his opportunity, and if he can free his mind from those traditions that are out of harmony with present demands he has a wide field before him. The problem is admittedly difficult, as we have to abandon so much that has given importance and dignity to our cities in the past and evolve for ourselves a new type of communal group making a quite different kind of appeal.

To those steeped in tradition the new housing schemes appear trivial and ineffective, and in several cases we see the absurdity of a road pattern laid out on the lines of Le Notre to provide for the needs of two-storey cottages. Formerly the city consisted of masses of building, supplemented by trees and gardens. Now building masses will only dominate in the industrial areas and in a few centres where the public buildings will be grouped; elsewhere trees will definitely dominate buildings, and our old traditions of mass and dignity can only be maintained in public parks and gardens which, with their connecting avenues, ought to form the framework of the city extension.

It appears very unlikely that any turn of the wheel will bring us back to such ideals of living as might enable us to give material shape to such imaginings as achieved the new town of Edinburgh, the city of Bath, and the like, but there are still demands for reconstruction that afford the opportunity of treating buildings in dominating masses, even where such masses are mainly regarded as a field for the activities of the advertiser. When this is the case it is no use our lifting our hands in horror; by so doing we only put ourselves out of court. The public demand advertisement, and it is up to us to show them that our towns can be as beautiful with it as without it. There is no reason why advertisement in every form should not be used as a basis for beauty in design, and it can make its appeal on this basis as soon as we can prove that the present attempts in colour and light to drown each previous effort can only result in a confusion that defeats its own end. This is perhaps the most extreme example of departure from tradition among modern developments, and its acceptance and employment for the purposes of our art would be a crucial test of our adaptability and our capacity to cope with all the changing conditions that demand our intelligent appreciation.

Discussion on the Papers

Professor T.H. HUGHES [A.], Director of Architectural Studies at the Glasgow School of Architecture: It is not without some hesitation that I make some comments on Mr. Lanchester's paper, for he is our greatest authority on the subject, and he has given us most concisely the basic elements of town planning. As to the question of zoning; personally I do not consider that question without also considering the question of satellite zones. We have got to think of town planning, not in terms of ten years or generations, but in terms of centuries. We may devise an admirable scheme with the town split up in several zones—zones as residential areas, industrial areas, civic centres, and so on. That may be all very well for ten or twenty years, but in a hundred years or so we may find the perimeters of the circles will overlap, and the whole affair which we carefully organised and thought out may be spoilt. It seems to me it is absolutely necessary that we should have some limit to the extent of our cities. We cannot go on as we are doing, growing and growing. I suggest that we consider zoning together with the question of restricting the areas to be covered by the city as was suggested years ago by Ebenezer Howard, by planning satellite zones round about the city. Mr. Lanchester when he spoke of Edinburgh and Bath said he thought these were rather enlightened times. Personally I do not believe our own country and age are worse than any other. James Craig's work in Edinburgh was really a speculation on the part of the Corporation. They wanted to develop the land on the north side and so they ultimately got this plan of Craig's. A little later Craig proposed another fine scheme for the development of the south side, but nothing came of that. Then in 1766 John Gwynne wrote his famous book on Land Improvement. He said City Fathers are absolutely hopeless in undertaking the arrangement of the planning of land, and when they do plan new streets they do not do so properly. He said just the same sort of thing as we are saying at the present time. If we look at France at the beginning of the eighteenth century, the towns which were really planned as complete units were planned not because the people desired beautiful towns to live in, but purely for military convenience. Other well-known examples like parts of Paris are more or less isolated places built by kings or princes for their own glorification. Take Bath. It was not built because the people wanted a beautiful city to live in; it was the whim of one magnate. We ought to have a desire to do everything we can for our cities in these times. What I would like to ask Mr. Lanchester is if he has any suggestions as to what to do next—how to set the ball rolling. I think we want civic associations in every town having a population of 50,000 or more—really active civic associations determined to push the thing through, and on these associations as many architects as possible. Before Chicago was carried out its business men found it necessary to advertise their scheme thoroughly. They published a little book on it, they had lectures in the schools, and illustrated it in the cinematograph theatres. We must make the people at large interested, and realise the importance of living in an efficiently planned and built city. Certainly I suggest we do something in the way of architectural education. More stress might be laid on the importance of designing buildings not to be only

nice in themselves, but to form a proper part of the big schemes for planning a town.

Mr. EDWARD P. WARREN [F.], President of the Berks, Bucks and Oxon Association of Architects: I have listened with the greatest possible interest to the very admirable contribution made by the last speaker as also to Mr. Lanchester's learned and interesting paper on the City of Edinburgh. It seems to me that in town planning there is such a thing as overdoing it. In the beautiful towns of all countries a very great deal of the charm may be owing to the natural history of its formation. Here in Edinburgh you had the good fortune to have a site for the town—what the French call extremely "accidenté." You have a site which as a whole nobody could have planned. If you take the High Street of Oxford, the curve of that street is inimitable. You could not plan a street like that. It has a subtle curve which could not be struck by compasses. That was the line which the cattle used to take on the land between the marshes and the rivers, and they have made a beautiful curve which has been maintained, first in mortar buildings and finally in stone. Oxford being a seat of learning, people have built colleges of great beauty there. Mr. Lanchester said good buildings should have good sites. Certainly, but you can reverse the maxim and say that good sites deserve good buildings. The necessity is for all sites, if possible, to be appropriate to the particular locality in which the site is being planned. There are a few old towns in which the town planning and original intention still remain intact. These are small towns. In France, there is the little town of Richelieu deliberately planned by the architect of the great Cardinal to provide a small town of dwellings for the gentlefolk of his court and their dependants. This little town is entered by a stately gate, with small houses and mansions all along a central street, and symmetrical cross-roads running off the street. If you are going to plan a new town to grow into a great city, you must leave a great deal for future developments. In these days civic, commercial and personal needs are always changing. The change is rapid, therefore I think in planning a town you must not be exactly too definite. Mr. Lanchester in describing the needs of the modern planned town said there would be the industrial quarter with its big commercial buildings, the public buildings, and inevitably in the modern town with modern economic conditions there would also be very large blocks of apartment dwellings, which would have much the effect of public buildings. It is precisely such dwellings that must be foreseen and thought of. There are buildings which of course define their character. The church, for example, has a traditional character. There are other buildings whose character is more or less preordained, but there are many in which we have not arrived at a traditional form.

Professor S.D. ADSHEAD [F.], Professor of Town Planning, University of London: May I add a word of appreciation to the readers of these two papers? When I descended upon Edinburgh last Monday I admitted to myself that it still kept up all its old reputation of being by far the finest city in Great Britain. The impression I had was that the scale of Edinburgh was greater than the scale of London. In scale it is a magnificent city—with the greatness of

DISCUSSION

its streets and the splendour of its openings. With regard to the remarks made by the first speaker on the origin of new Edinburgh, I think he omitted to give a little credit to the influence of France. I do not think new Edinburgh was quite so original as we were led to suppose in that paper. Probably James Craig and others were well acquainted with all that was passing in Paris at the time. So when we have the competition won by James Craig, we have really the tradition of Paris brought over to Edinburgh. Walking down George Street one cannot help thinking that the scale and the general disposition of the buildings and open spaces owe more to the influence of Paris than anything we have in this country. May I say one word in reference to those matters eminently affecting us at the present moment? We are in the throes of great road schemes and widenings. There is a tendency to talk too much about widening streets. I think it is a mistake to attempt to widen all our streets. It is for architects to lead the public in the policy of preventing motor traffic dashing rapidly through all our old towns. If our architects were to adopt the principle of having great roads round towns, and prevent the pulling down of narrow and historic streets and buildings, I think that would be wise. Princes Street itself is in some danger. This materialistic engineering way of sacrificing everything for transit is only a phase in modern evolution, and we shall regret it if we give way to it too much. We are also in the throes of large town development schemes and the administration of town planning acts which are all proceeding with regulations and other matters of administration, rapidly leading us into the old by-law methods. I want to warn architects that the more settled the administration of town planning becomes through an act, the less lasting and the less artistic will it be. Through all the rigmarole of by-laws architects must lead the imagination of the people in seeing how these acts are to operate. Unless they do so we will have our towns as hard, as crude, and as regular as the old by-law street of half a century ago.

Major H. C. CORLETTE, O.B.E. [F.], representing Australia, said: I should like to add how very much I have appreciated the two papers read to us. Mr. Marwick gave us a most interesting and illuminating address on Edinburgh, and the second paper was full of admirable suggestions. Mr. Warren asked in the course of his remarks: What must we do to-day? I think that question is really the crux of the whole situation. Professor Adshead has said something which makes us think what shall we do. What we have to do so far as I can see is to impress public authorities with the importance, the relative importance perhaps, of what architects may be able to say in connection with city development. It is not merely a question of city development. It seems to me it affects political questions: and the larger the outlook we have with regard to all these affairs, the more we are likely to be able to help those who have the final word which will decide how the future is to be developed in relation to the growth of towns. Does it not mean that what we as architects want to-day is a much greater opportunity to say what we think about the needs of the community as a whole, and that Conferences such as this one at Edinburgh ought to be held more frequently? We ought to take every advantage of the chances they afford to get members of public bodies to attend so

that they will hear what we have to say on some of those subjects that affect affairs generally. They are not sufficiently interested in architectural questions, and I am not sure that we can blame them. You, Sir, have said to-day that there is a representative of one of the Overseas Dominions present. I felt it was incumbent upon me to come here because the Federal Council of Architectural Societies in Australia has asked me to represent them at such Conferences. If we want to make our opinion felt, we have got to have these Conferences. We have got to take a much greater part ourselves in public work, and, if I may say so, I think, if we can only make up our minds that we are going to have one single strong and united body, everything that we may say on these subjects will be listened to, and some should be acted upon.

Professor PATRICK ABERCROMBIE [A.], Professor of Town Planning, Liverpool University: I want just to say in reference to Mr. Marwick's paper what an astonishing performance that appeared to me to be. To visualise, to make vivid before one's eyes the whole of the history of a city like Edinburgh in one short paper was an amazing achievement. Professor Adshead has referred to the influence of Paris in relation to James Craig. The same idea struck me, but quite differently, while the paper was being read. There is a very long-standing connection between France and Scotland, and I do not think any other nation in Europe, with the exception of the Scots and the French, could have produced a paper of exactly that quality. There were preciseness, exactitude, statistics, and while the paper was even formal in parts, it was at the same time human; it was warm, it was emotional, it was even romantic. We never get just those qualities with their lofty elements in England, but in France you will hear a speech delivered in much the same way. It was a remarkable performance. You will, I am sure, pardon me for referring to what struck me as one omission. It is an omission that seems to be frequently made in meeting with Edinburgh people and in talking about Edinburgh. You have in Edinburgh, it is true, an amazing number of magnificent features in your city, but there is one feature you possess which, I think, out-tops them all, and it is a feature that Mr. Marwick did not actually allude to. You have your castle, you have your ancient High Street—one of the most magnificent examples of picturesque architecture in Europe—and you have your Princes Street. One has to ransack Europe to find towns with similar features. That is a marvellous compliment to Edinburgh. But Edinburgh contains one feature that you cannot find in any other town that I know of, and it always strikes me anew with fresh wonder and with fresh beauty when I visit the city—Arthur's Seat. I do not think any other town has anything comparable to that so close to the city. It is very fortunate that it has been allowed to remain in its natural state. I am very glad that your monuments have been put on the Calton Hill and on the Castle. Fortunately you have left Arthur's Seat untouched, a piece of magnificent mountain scenery. It is outside the historic limits of your city, yet on the very borders. It does seem remarkable that if the two papers we have heard to-day were really the result of chance, they were most extraordinarily associated. You have the particular first, the actual town with its history and architecture, and then you have the general dealt with by Mr. Lanchester. It was a most

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fortunate coincidence, if it were nothing more than a coincidence. Mr. Lanchester took us back to the cave-dwellers, and Mr. Marwick did not go back so far. Yet both papers were exactly complementary, and I think they have given us the right basis for the consideration of this question of the relation of architecture to the future development of our cities.

Mr. HERBERT A. WELCH [A.] : I should like to add my tribute to Mr. Marwick for the very delightful paper which he has given us, and to which we have listened with such intense interest. I congratulate Edinburgh on possessing him as one of her citizens. Passing from that paper to Mr. Lanchester's paper, and to the remarks which have been made regarding it, I cannot claim so deep and intense a conception of Town Planning as some of those who have spoken, but I am a little concerned that one aspect has not been touched upon this morning. I was a little concerned not only with Professor Ashead's remarks, but also with the warm reception it received from those present, when he suggested that the future development of towns must be considered from the point of view of taking wheeled traffic outside rather than of bringing it within. It strikes me that is a most excellent theory, but how can that possibly be brought into effect in practice? The essential communication is in the heart of a city. You cannot stop people from getting within your town, otherwise your communication is bad. Taking them round is not a cure. That evades a satisfactory solution of a very difficult problem. The statement does not offer a solution, and a solution must be along other lines. Further, in the towns themselves, there is need for very much more serious and intense consideration of road problems, especially in those which have trams or other vehicles which must take a certain definite line along streets. Those who live in big towns go in peril of their lives day after day in getting off a tram or a bus when they find fast-moving vehicles swishing past at thirty or forty miles an hour. What are we to do with the problem of fast and slow-moving traffic proceeding along the same lines? That is one of the greatest problems we have to solve, and no one has touched upon it. I believe it is one of the most vital points affecting large existing towns, and, after all, it is there that the greatest difficulties have to be faced. They are the most difficult of solution as they are circumscribed by so many features and must, more or less, maintain their present form.

Mr. LANCHESTER (in reply) : With regard to those speakers like Professor Ashead and Mr. Welch who have taken the range of my paper beyond its original idea, I am grateful to them for expanding the subject, but I felt I had got enough on my hands without carrying it any further. There was a point raised by the first speaker in regard

to civic associations. I entirely agree with him, that every important place, and perhaps even less important places, should have a civic association. I do want to emphasise what I intended to emphasise in my paper. The first need of every city when you get a civic association is to understand. You must have a basis for your imagination, and by understanding exactly what the trend of the city is going to be you will find the basis on which to build your conceptions. I think Mr. Warren rather misunderstood me when he said there was one point which he deprecated—any provision beforehand, because a city must grow to some extent haphazard. Well, I think if you study your city you are better prepared for change in ideal than if you have not. That is the only point. Do not rest supine and say things are bound to change so much that we had better not do too much. I do not say too much, but understand as much as possible, and then you will be quicker to realise if the circumstances are changing and the city you have got in your mind is to be something rather different and more extended, more scattered, more of the form of the group city. What I feel is that the first need is to know as much as possible in order to see where you are likely to be led.

Mr. ARTHUR KEEN [F.], Honorary Secretary R.I.B.A. : We owe a vote of thanks to the writers of those two admirable papers that we have just listened to, and I wish to move that our thanks be accorded to them. The question has been asked what are we to do, what steps are we to take? Well, I think that what we, as architects, ought to do is to arouse the interest of the public in this matter of Town Planning, which has gone out of the hands of the aristocracy into those of the democracy, and it rests with us to educate ourselves and this democracy, to make the people interest themselves in Town Planning, to realise how important it is and how much depends upon it. If we can, we should make them understand on what the beauty of cities rests. I think you will find that the general public are very ready to be instructed in these matters, and any work that can be done in this way is extremely valuable. A few weeks ago, in connection with the Wren celebrations in London, I had occasion to show a number of people through churches that were built by Sir Christopher Wren, and I was astonished to observe how interested they were. They were eager to come again, and it seems to me it is always like that. If any lecture is given to the general public on architectural matters, there are always many interested, and I believe they will be far more interested in Town Planning if the essential points can be delivered with special reference to the place in which the lecture is being given. I have very great pleasure in proposing a vote of thanks for the most interesting papers we have listened to.

THE CONFERENCE BANQUET

The banquet was held on Friday night, 15 June, in the Freemasons' Hall, George Street. Mr. Paul Waterhouse, President of the Royal Institute of British Architects, presided over a distinguished company of ladies and gentlemen numbering over 200. Among those present were :

Lord Alness (Lord Justice Clerk), Lord Sands, Bailie Watson Sir James Balfour Paul, Sir Robert Philip (President of the Royal College of Physicians, Edinburgh), Mr. T. P. Marwick (President of the Incorporation of Architects in Scotland), the Rev. Professor Milligan (Moderator of the Church of Scotland), the Rev. Dr. Wallace Williamson (Dean of the Thistle), Mr. J. Alfred Gotch, F.S.A. (President-Elect of the Institute), Sir

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Frederick C. Gardiner, Lord Dean of Guild Forrest, Dr. George Macdonald (Secretary, Scottish Education Department), Mr. James L. Caw (Director of the National Galleries of Scotland), Mr. Andrew Grierson, S.S.C. (Town Clerk of Edinburgh), Mr. E. J. Partridge (President of the Society of Architects), Mr. Arthur Keen (Hon. Secretary, Royal Institute of British Architects), Principal Laurie (Heriot-Watt College), Sir Banister and Lady Fletcher, Sir Robert and Lady Lorimer, Mr. W. T. Jones (President of the Northern Architectural Association), Mr. E. P. Warren (President of the Berks, Bucks and Oxon Architectural Association), Mr. Francis Jones (President of the Manchester Society of Architects), Mr. H. V. Lanchester (President of the Town Planning Institute), Mr. Percy Thomas (President of the South Wales Institute of Architects), Mr. James Lochhead (President, Glasgow Institute of Architects), Mr. T. Aikman Swan (President of the Edinburgh Architectural Association), Mr. C. J. Soutar (President, Dundee Institute of Architects), Professor Baldwin Brown, Hon. A.R.I.B.A., Mr. Ian MacAlister (Secretary R.I.B.A.), Mr. W. Glassford Walker (Secretary, Incorporation of Architects in Scotland), Mr. Herbert A. Welch, Mr. William Woodward and Mr. A. Lorne Campbell.

After the loyal toasts had been pledged "Our Guests" was proposed by Mr. J. Alfred Gotch.

Mr. J. A. GOTCH (*President-Elect*): It is with some diffidence that I rise to propose the toast of "Our Guests." For here are we in Edinburgh, a city full of lofty memories, teeming with romance, steeped in traditions of high literature, enough to render mute any mortal who may have ventured to intrude into the domain of letters.

And here are we architects, brief sojourners in this enchanted city, privileged to greet as guests many of those who dwell within its precincts, and help to guide its destinies.

But I can assure you, honoured guests, that the awe you inspire does not diminish the welcome we extend.

Indeed, the more we architects mix on terms of friendship with leaders of thought, with captains of industry, and with the rulers of local affairs—the more we can do this, and lift the veil which shrouds the simple mysteries of our craft, the better it is for the Art we pursue, and for the great public whom that art must, in the very nature of things, affect most deeply.

The manifestations of that art are visible on every side, and yet, I fear, architecture is a sealed book to the public at large. Its intricacies, its technical terms, are apt to baffle, if not to terrify all but those devoted to its study. Yet, when the seals are broken, when the intricacies are unravelled, when the meaning behind the technical terms is expressed in simple language, the study of architecture, with all that it implies, becomes one of singular fascination.

It reveals the varying attitudes of mind in which man has considered those unseen forces which lie beyond his physical horizon, and which have ever constrained him to acts of worship. It records in enduring forms the changes in his outlook on life and in the measures he has adopted to meet the needs of his time in relation to safety and comfort. In short, the whole development of mankind in matters spiritual and physical is reflected in architecture.

This fascination we architects long to produce, or if we fall short of fascination, our earnest hope is that at least an intelligent interest may permeate the public, to its own lasting benefit, to the benefit of our art, and—need we hesitate to say so?—of ourselves.

The outside world knows but little of what goes to the training of an architect: the long years of study—study of the past, study of the present. The acquisition of knowledge most diverse in kind: knowledge of construction, both simple and complicated; of the habits and wants of mankind, so that buildings may be planned to satisfy them; of the means whereby these buildings may be made agreeable to the eye; of how to accomplish this without undue expense.

The study of the past not only renders us familiar with beautiful buildings, but tells us how the men of old solved their problems, and hints to us how we may solve our own. The study of the present enables us to bring to our solutions methods unknown to our fathers. Above all, this arduous training helps us in our most difficult task, that of presenting the result in an attractive form.

Here Imagination comes to our aid. The architect may not unreasonably aspire to range himself with "the lunatic, the lover and the poet," who "are of imagination all compact." But there is this difference, that whereas his three companions can give unfettered play to their commanding quality, the architect finds himself bound by unalterable facts. Of imagination he must indeed be compact, but not quite all compact, for he cannot ignore the practical aspects of his problems, aspects which are as naught to the lunatic, the lover and the poet.

The man in the street will doubtless concede that what I have indicated may be true in relation to some great and important building, but, believe me, the same qualities which are necessary to the production of large work are necessary to the little.

If only the great public could realise this, how much more beautiful would our cities be, how much more charming the countryside! So far as the health of the community is connected with building, protection is afforded by innumerable by-laws; but beyond the flesh there hovers the spirit; and the spirit should no more be wounded by atrocious designs than should the flesh by insanitary surroundings.

Thus, we welcome our guests not only for the pleasure their presence affords us, but also because we desire to establish a bond of mutual sympathy between them, as representing the public, and ourselves as architects, whose feelings are sometimes harrowed by the fear that our true function is hardly understood.

It is a wide circle that is included in this toast, for our guests reflect many aspects of life: the City and the Church, Art and Science, Law and Learning, Letters and Commerce, and that ever increasing and I hope benign influence in public affairs that is wielded by the Ladies.

I give the toast of "Our Guests," and beg to coup'e with it the names of Bailie Watson (in the absence of the Lord Provost of Edinburgh), Lady Fletcher, and the Rt. Rev. Wallace Williamson.

BAILIE WATSON responded on behalf of the City of Edinburgh, in the unavoidable absence of Lord Provost Hutchison.

LADY FLETCHER, who also responded, said she could not but be conscious that they were not only the guests of

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the Royal Institute of British Architects, but also the guests of Bonnie Scotland. She believed after a long experience of Conferences that they were very good things, should she say when they were not Government Conferences? She thought most conferences helped people to smooth out their difficulties and to understand one another's point of view. She understood that the Institute was not entirely free from differences of opinion. She thought a Conference of that kind would help towards a solution of those difficulties. There was the word registration. She knew something about registration. The difficulties of registration had split many societies, including the nurses, and they had all come to a solution in the end, and she thought that doubtless they would do the same. On the more personal aspect of the matter, she thought from the fact that she had been asked to take part in replying to this toast of "Our Guests," it was clear that their Council had moved with the moving times. It had wisely decided to recognise the soul in the eternal feminine and she was greatly honoured and pleased that she was asked to reply for the ladies. The Council of the R.I.B.A. had recognised that the old order sometimes changed and had decided to give women their chance and to recognise their ability where it existed. She did not think they need be alarmed about the competition of women. At the present time she did not think there were more women architects recognised than there were women Members of Parliament, and men apparently did not consider them to be great competitors there. In fact, the only thing she could see was their interest in observing how the women M.P.'s dressed. She was very glad to have voiced the thanks of the women and to respond to that toast of mixed foursomes.

The Rev. Dr. Wallace Williamson also responded.

LORD SANDS, proposing the toast of "The Royal Institute of British Architects," said: I am aware that the majority of those present are Members of that Institute, but still I think that they can all be invited to drink to its health because, though it might be inappropriate that one should, on a public occasion, honour one's own personal health, one is always justified in honouring the health of the corporate soul of the community to which one belongs. The Institute has honoured Edinburgh by its visit. We greet their visit with satisfaction, and we congratulate them upon their choice of a city, because, altogether apart from historical and romantic associations, I think it would be difficult to find a city more worthy of the visit of the Institute of British Architects than Edinburgh, whether they were in search of examples or of warnings. I cannot suppose that I have been honoured by an invitation to propose this toast because I have been a benefactor of architects. I have always contrived with very minor exceptions to keep my own hands out of the mortar pot, but I have had professionally and judiciously a good deal to do with architects. I cannot say that the questions which I have had to canvass are of a very distinctively aesthetic character. Such questions as I have been familiar with are, to take an illustration, "Suppose an architect is invited to prepare plans and specifications for a building and that building is not proceeded with, is the architect entitled to commission upon the prospective cost; and, if so, at what rate ought that commission to be allowed?" In the course of my professional experience with architects I have been struck by the circumstance that they appeared

to be singularly forgetful. I am not speaking of English architects, because my experience is limited almost exclusively to Scottish architects, but Scottish architects, when they prepare plans and specifications and submit estimates of costs, always forget the architect's fee! I call it forgetfulness, but perhaps it is modesty. All these are sordid matters, however, and I would rather address myself for a moment to a more idealistic aspect of the architects' profession. Architects are all striving after two ideals—utility and beauty. Now, it is an interesting question whether these two are coincident. It is quite easy to make them coincident if you make beauty synonymous with utility. That is an easy thing, but it involves a certain abuse of language. If you address yourself to the consideration of the two words utility and beauty, and attach to each their ordinary meaning, I am afraid you cannot give an affirmative answer to the question whether utility is always coincident with beauty, but, mark you, one must not go to the opposite extreme and suppose or imagine that there is any antagonism. If you see a singularly ugly house there is no presumption from the ugly exterior that internally it is a most convenient and commodious house. On the contrary, there is a certain presumption that it is not so, because the architect who designed such an ugly exterior is not very likely to have designed a comfortable and commodious interior. But whilst that is so, and whilst one cannot affirm that utility and beauty necessarily go together, I think that one must recognise that the necessity to adapt a building for certain purposes may furnish inspiration in the creation of the beautiful. Take our English cathedrals. I do not know if it will be universally admitted, but it is certainly my own opinion that these are the most beautiful buildings in England, if not the most beautiful buildings in the world. Now these buildings were gradually evolved. The original idea when churches, from which cathedrals arose, were built, was not the designing of a beautiful building but the designing of a building suitable for certain forms of worship, and for certain rites and ordinances, and to that came to be superadded the idea of the necessity of conforming with certain rules of symbolism, and so the cathedral arose. Now I beg you to assume for a moment that we had no churches and no cathedrals, and that you invited all the most distinguished architects in the country to furnish designs for a beautiful building without regard to any purpose to which that building might be put. I have no doubt that you would get many beautiful plans and designs, but on the supposition which I put, that we knew nothing of churches and cathedrals, I venture to think that none of these buildings would have the remotest resemblance to one of our cathedrals, and I venture to add that not one of these buildings, great as is my respect for the ability of the architects of the present day, could compare with one of our ancient cathedrals. In the evolution of the cathedral the necessity of designing buildings adapted for certain purposes and to conform with certain rules of symbolism has been an aid, and not a hindrance, to the inspiration of the architect. It is the same in poetry. The metre and the rhyme one might regard as a hindrance to the free stirring of the imagination, but it has not been so so far. On the contrary, they have been found to be a source of inspiration and of imaginative development and expression, and so it is in architecture. The necessity for con-

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forming with certain purposes, certain ideals, certain symbolism, has been an aid and not a hindrance to the development of architecture. These, however, are high and difficult subjects, perhaps hardly appropriate to an after-dinner toast. I revert to my proper subject, the Royal Institute of British Architects, the corporate organisation of the architects of this country. Now the architect has a certain advantage over my own profession, over the medical profession, over many other professions, a certain advantage and also a certain responsibility. In my profession, in the medical profession, and in many other professions, one may say it will be all the same a hundred years hence, but the architect cannot say that. His work is enduring. At all events it is enduring if he works with Aberdeen granite or British freestone. I am not quite so sure about reinforced stucco. The work of the architect is enduring, and I sometimes regret that the Scottish architects of the eighteenth and early nineteenth centuries did not more fully realise this truth. But I am quite sure that those who are gathered here to-night fully realise it, and fully realise their responsibilities to future generations. There is perhaps only one order in the community that can claim an immortality greater than that of the architect. I mean the poet. Only the poet can claim to have created something that will endure any work of man's hands. Architects who are here present will take some consolation in the fact that poets in the present day are so scarce that their claims to superior immortality need excite no jealousy. I venture to predict that that Cenotaph in Whitehall will outlive all the poetry that has sprung from the late European War. I appreciate the honour of being invited to propose this toast, and I have special pleasure in coupling it with the name of such a distinguished member of the profession of architects as occupies the chair to-night.

THE CHAIRMAN (in reply): It was not for nothing that we men of England joyfully accepted the invitation to have the conference in this city. We know where good-fellowship is to be found, good fare and goodwill, and we have come here to enjoy those things. You sometimes come south to share our toil, our remunerative toil. We come here joyfully to share your pleasures. I am very proud to have been the President of the Institute. It has been a special gratification to me to realise that your Incorporation has been established during my presidency, although I cannot say that, personally, I have had much share in carrying it through. In doing honour to us, you have at the same time recognised through the R.I.B.A. the supremacy of Britain for the moment! Nobody can quite know how big an affair the R.I.B.A. is unless he has been a President or one of the Secretaries of the Institute. He cannot have the faintest notion of what the Institute really means, not in Britain only, but in the world. It is astonishing to me—and very many things which come into the President's hands do not find their way into the ordinary printed records of the society—to realise that the man who stands for the moment as President is in the position of being virtually the Head of a Republic on which the sun literally never sets. From all over the world we get correspondence. Sometimes it is worry, sometimes it is congratulations, and sometimes it is merely a show of pure affection. I shall

retire in a few weeks into the publicity of private practice, and a new man will reign in my stead, and I desire to commend Mr. Gotch very warmly to you.

I happen to be very much interested in architectural education. I am going to spend next week in examining Scottish schools, a pursuit which is always one of peculiar pleasure to me. I know beforehand what I am going to see—good work, good teachers, and diligence. I want to say this about education in architecture, that it cannot go on without the cordial goodwill of the architects who practise in the places where the education is conducted. Nowhere more than in Scotland is that goodwill so abundantly seen. Wherever I go I see that the architects are the friends of the young men in this matter of education. That means a great deal even now, and it has meant a great deal in times past. Our fathers did a great deal and made a great sacrifice when they realised the time had come for systematic education for young architects. To put the matter on its lowest level, it meant giving up pupils' fees. That generous spirit, that national spirit, has gone on increasing, and I heartily congratulate Scotland on her work in that direction. It will not have escaped your notice that there has been an Institute election. You will treat me, I hope, merely as a fellow-voter for the moment. It is quite an embarrassing situation, and I hardly know where to begin, but I am going to begin with congratulations. That this Institute should have parties within it is not only unreasonable but absurd, because we have only one object, the advancement of architecture. Of course, differences of opinion must arise as to how certain results are to be achieved. But what I want to say is this, and I say it without casting any reflection on anybody's conduct or character, that I believe we shall never retain any influence whatever in our great and glorious Institute unless we fervently and steadfastly make up our minds that we shall always fill our Council and the presidential chair with persons who, we think, are reasonably representative of the forefront of architecture. I know it is a case of "glasshouses" for me to talk like that, having been a member of Council for so many years, and having occupied the presidential chair, a post which, I may add, I never sought, though it was a great honour to have filled it. It may occur in the future that there is a wish to put in persons representing minor issues on small questions in dispute. That will not succeed. The Institute is too big a body for that kind of thing to be expected to succeed. Remember it is world-wide, remember it covers Britain. We must make perfectly sure that we put men there who we feel will represent, not a particular view on a particular subject, but architecture. Before sitting down let me add a word about the Incorporation of Architects in Scotland. I wish it the longest possible life, every kind of prosperity, every happiness, and every success.

LORD ALNESS (in proposing the toast of "The Incorporation of Architects in Scotland and the other Allied Societies"): As you will see, this toast is a composite one, and the first branch of it relates to the Incorporation of which we have heard so much to-night. As a loyal Scot, and withal I hope a modest one, I was not in the least surprised to be informed that the Scottish Society, of all the Allied Societies, was probably the most important. That, of

course, is as one would expect, and as it ought to be. I am told that the Scottish Society has a membership of nearly 600, with chapters in all the great cities of Scotland, and that it is steadily increasing in vigour and influence. There is just this to be added, that, owing to the munificence of Sir Rowand Anderson, whose name is familiar to all of us, the Society has been enabled to vote several thousand pounds to architectural education, and no man can gainsay or exaggerate the importance of that topic. But the toast is not merely parochial; the second branch of it relates to the other Allied Societies and gives an imperial aspect to the toast. If you ask me where these Allied Societies are to be found, I think the answer would be in every corner of the British Empire. Australia, New Zealand, and Canada have already contributed their quota, and, to-day, I understand that South Africa and Singapore are being enrolled as members of your great organisation. That is a notable achievement. It is a triumph of federal organisation. Now may I just add this, bearing out what Lord Sands has said that your profession and mine not infrequently meet? It has been my lot as a practising counsel at the Scottish Bar to examine architects as friendly witnesses, and to cross-examine them as hostile witnesses. Naturally, I have more vivid recollections of the latter process than of the former process. I think Mr. Marwick shares some of these recollections. Well, I have always realised, when I was in that position, the difficulty in which a counsel is sometimes placed. He is sometimes supposed in a few short hours to equip himself with a special knowledge which will enable him to deal on equal terms in the witness-box and, if possible, overthrow a man who has devoted his whole life to the study of the topic. What my experience may have been in that particular it is not for me to say, but it is a difficult task, as you will readily understand and admit. May I just add that architects not only come into contact with lawyers from time to time, but also with Ministers of the Crown. It was my experience when I was Secretary for Scotland, and as such I was responsible for the housing programme in Scotland, to come into contact with architects on both sides of the Border, and may I say that I shall not readily forget the efficiency, the reliability, and the helpfulness which I experienced at their hands? But, after all, giving evidence in the witness-box and erecting houses for the working classes are but mere by-products of your great profession. That profession has many notable characteristics, one or two of which have been referred to already. One of these is its age. I was greatly struck the other day by a phrase which I came across in that connection. It was used by the Public Orator at Cambridge in presenting an honorary degree to one of the most illustrious architects of the day, Sir Aston Webb. In addressing him, the Public Orator used the words of the Roman poet, "God was the First Architect." Was the Roman poet not right, and does it not fall to the human architect either to add to or to subtract from the beauty of the world which the Divine Architect has framed? Age is one of the characteristics of your profession. The other has been referred to by Lord Sands, and that is the permanence of your work. It is given to few of us to create work which will earn immortality. That is your privilege. It is a high responsibility. You do not need to go to Assyria or to Egypt, although great lessons can be learned in the East. You do not have to travel

beyond the work of Wren in London, or beyond those great shrines which I understand you have visited to-day, in my old constituency in the Borders, round which so many sacred and soul-stirring memories cluster, in order to appreciate that, though the work of most men dies, the work of the architect lives; and therefore a great trust devolves upon you of which I am confident you will prove worthy. I will content myself by adding that your past provides at once an inspiration and a challenge for the future. I wish that your future may be equal and, if possible, may even excel your past. It is my privilege to link with this toast two well-known names. There is the name of Mr. Marwick, of whom I have had experience both as a friendly and a hostile witness. There is also the name of Mr. Francis Jones, President of the Manchester Society of Architects, and therefore representative of a city which in vigorous enterprise, in ordered progress, and in high culture may even vie with the city in which you are met to-night.

MR. T. P. MARWICK, President of the Incorporation of Architects in Scotland (in reply): I desire on behalf of the Incorporation to convey to Lord Alness our warmest thanks for the kind words he has spoken, and I thank you all for their generous reception. The Incorporation, though young in years, has already well over six hundred members. You have heard of the gift to us of a home suitably equipped and endowed. We shall ever cherish the memory of our benefactor, and shall prove our gratitude by faithfully administering the trust placed in our hands. We shall exercise all our knowledge, skill and energy, in the endeavour to do good and useful work, and to achieve the objects the donor had at heart. I may state that we have dedicated over one-quarter of our entire capital to educational purposes. We have, in conjunction with the other beneficiaries, assisted in the publication of the recently issued beautiful book of measured drawings of Scottish Domestic Architecture. We are working in conjunction with the Board of Trustees for the National Galleries of Scotland in the publication of the National Art Survey Drawings. I recommend to your special attention the first volume. The second volume is being printed now for early issue. We purpose, if possible, proceeding with the completion of several hundred drawings partly prepared, and such additional drawings as may be required to complete the survey of every important historical and architectural monument in Scotland. We shall not be satisfied until this is done, so as to preserve accurate records of these before the tooth of time accomplishes their destruction.

We have commenced the publication of a quarterly magazine; have a benevolent fund to help those who fall by the way; and in other fields of endeavour we are trying to do good work for the community and for the advancement of the art of architecture.

I may state also that we are taking preliminary steps to obtain a University Degree in Architecture, and matters are well advanced for this in Glasgow. In the Edinburgh Chapter a special committee will suggest a series of existing classes in the University, Heriot-Watt Technical College, and the College of Art, so as to form a School of Architecture. We think this can be done, and by adding lectures in civic design and professional practice it would make a complete course. Degrees are granted in London, Liverpool,

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Cambridge, and several other English Universities, so that there is no reason why Scotland should lag behind.

Of course we quite appreciate the fact that a great creative artist is specially endowed by nature, that little can be done probably to develop imaginative qualities, but we know that in scientific and practical work an immense amount of good can be accomplished by systematic training. Art by itself is apt to starve in these days, and our desire is to present prospects of a good status and reasonable reward to young men of ability and education wishful to enter our alluring and fascinating but very neglected profession.

The Incorporation are also anxious to assist in closing the door to the practice of architecture by the unqualified. We consider that architects require as much education and ability as those who practise law or medicine. They ought to live in as cultured an atmosphere, their work is as important, and they are as vitally interested in the health, well-being and good guidance of the community.

The Incorporation exists at present solely as a consultative and administrative body, and its formation ought to give the profession here a solidarity, force, and influence which at present it only possesses to a limited degree. This influence they hope to be able to utilise in fostering the growth of our towns and villages on artistic, practical, and sound financial lines, in developing the æsthetic sense of the community, and in endeavouring to arouse and widen public appreciation of architecture.

In the United States of America a very marked advance in architectural talent has taken place of late, largely owing to the foundation of Schools of Architecture, and the stimulation of public interest. During the last five and twenty years the design of their public buildings has immeasurably improved in all the qualities which make for good art. This was clearly shown in the recent exhibition of American drawings in London, Glasgow and other cities. We want to travel along similar lines.

Architects write the history of a nation in stone. They erect the milestones on the highway of civilisation and progress. Their work affects the health and æsthetic education of the people and endures for generations either to elevate or degrade public taste. Publicity stimulates interest, and our success in the long run depends upon public interest. Architectural work of importance is surely worthy of as much attention as a prize fight, a football match, or a horse race. So long as men of conspicuous talent are unappreciated, and their most earnest efforts passed by without intelligent criticism and recognition, they will be discouraged and mediocrity will abound. There is no stimulus to excel, whereas there is no limit to the benefit due acknowledgment of merit may accomplish.

One loves to see praise and pleasure given to the worthy while they are living to enjoy them. Post-mortem eulogy is of as little avail as laying wreaths upon unresponsive sod. The dead neither hear nor see. Let us therefore bring out our alabaster boxes now, and so hearten and encourage those who do well, that they go on and do better. As I said yesterday, look back 156 years and you will see that the enlightened public in this city in 1767 were in advance of the public of to-day. They knew and appreciated good work so highly that they actually gave the freedom of the

city and a gold medal to the architect who won the competition for the lay-out of the New Town. The present-day apathy of the public is so great that such happenings now are inconceivable. Talking of 1767 recalls the fact which you have already heard, that our present enlightened Corporation have appointed a Consultative Committee to co-operate with the Town Planning Committee of the Council in the work of city development on right lines. I trust this action will be followed in due course by the appointment of a Fine Art Advisory Committee such as exists in New York. If you read the last report of the New York Commission you will see a record of what has been accomplished. There can be no doubt that it tends to the production of noble, dignified, and well-proportioned buildings. It does good work in the creation and maintenance of all the accessories of a beautiful city, and one would like to see somewhat similar methods applied here.

I can assure you that the members of the Incorporation of Architects in Scotland are inspired by high ideals, and you all know that high ideals are a prepotent influence in the spiritual and intellectual progress of a nation. They intend to work, so far as they are able, for the realisation of these ideals, and, while progress may at first be slow, they are encouraged by the knowledge that the ideals of yesterday become transmuted into the actualities of to-day.

I thank you all very sincerely for your courtesy and for your generous kindness in wishing us God-speed in our work.

MR. FRANCIS JONES [F.], President, Manchester Society of Architects : It is a great honour to have been asked to reply on behalf of the Allied Societies. In the first place I should like to say something about the elections to which the President referred. You all know that those elections have resulted in a clean sweep of the old Council. All I want to say about that is this, that we have not finished by making a clean sweep of the old Council. It is now up to the new Council, all of us, to get inside the Institute that unity which will prevent any repetition of what has occurred in the last two years. Mr. Marwick represents, one might say, the unity of Scotland. In other words, the Allied Societies of Scotland. The Royal Institute represents not only the combined Allied Societies of England, but also the combined Allied Societies of Scotland as well, so that we have the whole body of British Architects in the Institute, and in that body we have to preserve a united front, or else we shall do no good. I would just like to point out two things : the first is that for the first time, as far as I am aware, we have the President of a provincial Society as President of the Royal Institute. Not only have we a President who is a provincial member, but I think I can say, and I feel everybody will agree with me, that we have a President whose term would probably have come long ago if he had happened to be not a provincial member but a London member. In other words, the only disqualification for Mr. Gotch's earlier election was the fact that he was a provincial member. I feel in electing him we have elected not merely a provincial member, but one of the most suitable men we could have had as President of the Royal Institute of Architects. The second thing I would like to say is just to point out that the new Council is, with the representation of the provincial societies, larger than it ever was before.

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Therefore the provincial members will agree with me that the Council ought to be better than ever it was before. There again it depends on the intelligent members' diligence in turning up to meetings. As a provincial member myself, it will be a considerable tax upon my time to come up to London to attend the meetings, but if members are elected to the Council they must really turn up, and show their interest, and carry there the interests of their own societies. I will content myself at this late hour with thanking you very much for the manner in which you have received this toast, and I have pleasure in calling upon you to give three hearty cheers to our retiring President, Mr. Waterhouse, as this will be his last public appearance, probably, in the Presidential Chair of the Institute. The occasion demands some cordial recognition on our behalf.

Three cheers were given with great warmth to the retiring President, and Sir Robert Lorimer, in proposing a vote of thanks, paid a notable tribute to Mr. Waterhouse for his great services to the Institute during his two years of office.

LIST OF MEMBERS ATTENDING THE CONFERENCE.

Among those present at the Conference were the following :—Professor Patrick Abercrombie [A.], Mrs. Abercrombie, Professor S. D. Adshead [F.], Mrs. Adshead, Miss Adshead, J. P. Alison [F.], John Armour [F.], James A. Arnott [F.], Mrs. Arnott, J. A. Arthur, Lt.-Col. J. Maurice Arthur, C.M.G., D.S.O. [F.], Wm. Baillie [A.], Wm. Baillie [Licentiate], Mrs. Baillie, Andrew Balfour [F.], Mrs. Balfour, Major Harry Barnes [F.], John Begg [F.], R. Blackadder, Professor Baldwin Brown [Hon. A.R.I.B.A.], D. M. Brown [Licentiate], Wm. Brown [F.], G. Washington Browne, R.S.A., Herbert T. Buckland [F.], Miss Buckland, James D. Cairns [Licentiate], Mrs. Cairns, A. Lorne Campbell [F.], G. E. Charlewood [A.], D. J. Chisholm [A.], Major Hubert Corlette, O.B.E. [F.], H. R. Cowley [A.], George Craig [Licentiate], James H. Craigie [F.], Frank Crombie, J. C. Cunningham, H. A. Dalrymple [A.], Mrs. Dalrymple, Wm. Davidson, F. W. Deas [F.], R. Burns Dick [F.], F. M. Dryden [Licentiate], Mrs. Dryden, Chas. Dunch, James B. Dunn, A.R.S.A. [F.], Mrs. Dunn, F. E. Pearce Edwards [F.], Mrs. Edwards, James Ellis, Mrs. Ellis, Chas. T. Ewing [Licentiate], J. Graham Fairley [F.], J. McLellan Fairley [A.], R. W. Ferguson [A.], Sir Banister Fletcher [F.], Lady Fletcher, D. W. Galloway [Licentiate], Hugh Gavin, Edw. M. Gibbs [F.], James Gillespie [Licentiate], J. Alfred Gotch, F.S.A. [F.], Alex. Grant (President Inverness Architectural Association), John P. Grant [A.], Geo. H. Gray [A.] (Hon. Secretary Northern Architectural Association), Hastwell Grayson [F.], Mrs. Grayson, Miss R. C. Grayson, William B. Halley, Robert L. Hardie, J. Wilson Hays [A.], J. Macintyre Henry [F.], H. L. Hicks [A.], E. Percy Hinde [F.], Victor T. Hodgson [Licentiate], Mrs. Hodgson, Richard Holt, G. J. Howling (Editor *Architects' Journal*),

Harry Hubbard [A.], T. Harold Hughes [A.], Mrs. Hughes, Theodore K. Irvine, John Jerdan [F.], Mrs. Jerdan, Francis Jones [F.] (President Manchester Society of Architects), Mrs. Francis Jones, Ivor P. Jones [A.] (Hon. Secretary South Wales Institute of Architects), Mrs. Ivor Jones, J. Herbert Jones (Hon. Secretary, Western Branch, South Wales Institute of Architects), W. T. Jones [F.] (President Northern Architectural Association), Stewart Kaye [A.], Arthur Keen [F.] (Hon. Secretary R.I.B.A.), C. H. Kempthorne [Licentiate], John Keppie [F.], Henry F. Kerr [A.], A. Hay Lamont [A.], Mrs. Lamont, H. V. Lanchester [F.], Mrs. Lanchester, T. Alwyn Lloyd [F.], Mrs. Lloyd, Alfred G. Lochhead [A.], James Lochhead [F.] (President Glasgow Institute of Architects), J. A. E. Lofthouse [F.], Alex. Lorimer [Licentiate], Sir Robert S. Lorimer, A.R.A., R.S.A. [F.], Lady Lorimer, Ian MacAlister (Secretary R.I.B.A.), Mrs. MacAlister, Malcolm S. McCallum [A.], Alex. McGibbon [A.], J. A. H. Mackenzie, Mrs. Mackenzie, D. M. Mackie, T. F. MacLennan [A.], J. Ross McMillan [F.], Alex. McWilliam [A.], Craigie Marwick [Licentiate], T. P. Marwick [F.] (President The Incorporation of Architects in Scotland), T. R. Milburn [F.], Mrs. Milburn, Wm. Milburn [A.], Geo. Angus Mitchell [A.], Geo. Bennett Mitchell, M.B.E., D.L., R. M. Mitchell [Licentiate], Mrs. Mitchell, James A. Morris, A.R.S.A. [F.], J. Inch Morrison [Licentiate], Mrs. Morrison, R. H. Motion, Mrs. Motion, Miss Edith Naylor, J. Bryan Nisbet [Licentiate], G. Dale Oliver [R.F.], Barry Parker [F.], Alex. N. Paterson, A.R.S.A. [F.], Mrs. Paterson, Geo. A. Paterson [A.], Mrs. Paterson, James Paterson, R.S.A., J. Wilson Paterson [A.], Mrs. Paterson, Wm. Patterson, A. F. Balfour Paul [Licentiate], W. T. Plume [Hon. A.R.I.B.A.], F. A. Richards [A.], Mrs. Richards, James Robb, Thomas Ross, James Salmon [F.], Mrs. Salmon, David Salmond [F.], Wm. Salmond [Licentiate], Mrs. Salmond, Thos. W. Sharpe [Licentiate], Mrs. Sharpe, Stewart Sim, George Simpson (Edinburgh), George Simpson [Licentiate] (Glasgow), G. Sinclair [A.], Laurence H. Smart, J. Llewellyn Smith [Licentiate], Thomas Smith, Miss Smith, Chas. G. Soutar [F.] (President Dundee Institute of Architects), Mrs. Soutar, John Steel [F.], D. A. Stewart [Licentiate], John Stewart [F.], T. Aikman Swan [A.] (President Edinburgh Architectural Association), A. A. Symon [Licentiate], Walter Tapper [F.], H. A. Tarbolton [F.], John Taylor, L. W. Taylor, H. Teather [F.], Mrs. Teather, Miss Teather, Percy Thomas, O.B.E. [F.] (President South Wales Institute of Architects), Mrs. Thomas, W. D. Thomas, P. H. Thoms [F.], Wm. Thomson, W.S., Professor R. Traquair [F.], Charles E. Tweedie, J. W. Ward [Licentiate], Edward Warren, F.S.A. [F.] (President of the Berks. Bucks and Oxon A.A.), Paul Waterhouse, F.S.A. (President R.I.B.A.), Geo. W. Watson, John Watson [F.] (Edinburgh), John Watson [F.] (Glasgow), John F. Watson, Maurice E. Webb, D.S.O., M.C. [F.], Herbert A. Welch [A.], Wm. B. White [F.], J. Teifion J. Williams, J. A. Williamson [A.], John Wilson [F.], Mrs. Wilson, John Wittet [Licentiate], Mrs. Wittet, Wm. Woodward [F.], J. A. Woore [A.], Mrs. Woore, Percy S. Worthington, Litt.D. [F.], C. J. M. Young [A.], G. P. K. Young [F.], Guy St. J. Makin, of South Australia.

A RÉSUMÉ OF THE PROCEEDINGS

By universal consent the Conference at Edinburgh was the most successful of the series. To say so is not to disparage the events of Liverpool and Cardiff. It is really a compliment to them. The enthusiasm created by those two memorable meetings was largely responsible for last week's success. Those who had enjoyed the hospitality of Lancashire and South Wales came eagerly to Edinburgh and brought their friends with them. The result was an attendance that broke all records.

The members, who arrived in Edinburgh on the 13th, were entertained at a delightful Smoking Concert by the Incorporation of Architects in Scotland, whose President, Mr. T. P. Marwick [A.], occupied the chair. An evening of a completely Scottish character was opened by a speech of warm and kindly welcome from the Chairman, and closed by an expression of thanks on behalf of the guests by Mr. J. A. Gotch [F.]. If there was any ice about, it was very decisively broken that night.

At 10 o'clock the following morning more than 200 members gathered in the Council Room of the City Chambers, where Lord Provost Hutchison and the Magistrates of the City of Edinburgh gave a cordial welcome to the Conference. Mr. Gotch took the chair, in the unavoidable absence of the President, and two admirable lectures were delivered. Mr. Marwick on Edinburgh: "Its Rise and Progress," and Mr. Lanchester on "The Place of Architecture in City Development," formed a perfect combination, and the discussion that followed sustained the very high level of the lecturers, to whom a cordial vote of thanks was given on the motion of Mr. Arthur Keen, whose graceful little speech closed the proceedings.

The whole party then walked up by way of the High Street, the Lawnmarket, and Castle Hill to the Castle, where they were joined by others who had preferred the sights of Edinburgh on a sunny morning to the solemnities of the City Chambers, and an excellent luncheon was served in the old rooms in Crown Square. Four brawny pipers played their loudest outside the windows, but the cheerful noise of conversation more than held its own.

After a rapid inspection of the Castle, including the Armoury and Queen Mary's apartments, a group photograph was taken on one of the slopes of the Castle Rock, and the party then embarked on charabancs and drove down the famous "Mile," through the High Street, past St. Giles' Cathedral, and down the Canon-gate to Holyrood Palace, where by special permission the State Apartments were visited. The drive was then continued round Holyrood Park and Arthur's Seat, and back through the New Town to the National Gallery, which was the scene of a cheerful "At Home" in the

setting provided by the national collection of pictures. There was just comfortable time to dine before the Reception by the Lord Provost in the Freemasons' Hall. The gorgeous robes of our host, the fearsome weapons of his attendants, the cheerful music, the solid hospitality, and the welcome presence of many of the leading figures of Edinburgh life, all contributed to the success of a delightful evening.

On the morning of the 18th a still earlier start was made, for at 9.15 a procession of charabancs started on a round tour which covered some of the most beautiful scenery of the Scottish border country. Over the hills by Lauder and Earlston to the Tweed—the ruins of Dryburgh Abbey—an energetic lunch at Melrose—a visit to the ruins of Melrose Abbey—then up the valley past Abbotsford to Peebles and tea; so far, the weather held out. A mild rain chased the party back to Edinburgh, but no great harm was done, and everyone was in time for the great closing event, the Conference Banquet in the Freemasons' Hall. Nearly 200, including an exceptionally large number of ladies, were present. Our guests included many of the most distinguished of Edinburgh's citizens. The Southern visitors were thrilled, and some of them intimidated, by the ceremony of the entry of the Haggis. At last we had the President in the Chair and the speech that we had all looked forward to. From our guests we had eloquence, wit, and wisdom. The evening closed with tumultuous enthusiasm.

Very wisely, the final day was "go-as-you-please." So many people wanted to see so many separate things that organised movement would have been less helpful than usual. Everyone made his own arrangements, and though the Conference ended officially on Saturday it was not until Monday that the last of the visitors were able to tear themselves away.

As usual, the work of organisation fell almost entirely upon the tireless and self-sacrificing members of the local "Arrangements Committee." To ensure the smooth running of the crowded programme months of preliminary work had to be done. The complete success of the Conference showed how ungrudgingly that work was done. Their names ought to be recorded here. Under the leadership of Mr. Marwick were Mr. John Begg [F.], Mr. John Keppie [F.], Mr. Henry F. Kerr [A.], Mr. F. C. Mears, Mr. J. McL. Morrison [Licentiate], Mr. A. N. Paterson [F.], Mr. T. A. Swan [A.], Mr. John Watson [F.], Mr. A. Lorne Campbell [F.], Mr. William Davidson, Mr. Stewart Kaye [A.], Mr. J. R. M'Kay [A.], Mr. E. J. MacRae [A.], Mr. J. Wilson Paterson [A.], Dr. Thomas Ross, Mr. H. O. Tarbolton [F.], Mr. James B. Dunn [F.], Sir Robert S. Lorimer [F.], and Mr. T. F. MacLennan [A.].

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Foremost among this band of workers were Mr. Marwick (the President), Mr. A. Lorne Campbell (Convener of the Receptions Committee), Mr. Stewart Kaye (Convener of the Excursions Committee and stentorian C.G.S. of the motor parties), Mr. J. R. M'Kay (Convener of the Hotel Accommodation and Hospitality Committee), Mr. Henry F. Kerr (Convener of the Programme Committee), and Mr. J. Wilson Paterson, of H.M. Office of Works, who helped us so admirably in the visits to the Castle, to Holyrood, and to Dryburgh and Melrose Abbeys. To all of them, and to Mr. Glassford Walker, the ever courteous and careful Secretary of the Incorporation, upon whose willing shoulders fell so heavy and continuous a burden, we owe a debt of thanks that cannot be adequately expressed here.

And outside our own body we are under a deep obligation to those citizens of Edinburgh whose gracious hospitality did so much to ensure the success of the Conference. Above all, we are indebted to Lord Provost Hutchison for the real interest that he took in our proceedings, for the permission granted to us to hold our inaugural meeting in the City Chambers, and for his generous hospitality in the Freemasons' Hall.

The Provincial Conference of 1923 has set a standard that it will be hard to equal, perhaps impossible to surpass, in future years.

I. M.

Copies of the Conference Group Photograph can be obtained from Mr. E. Holford Debenham, 4 West Maitland Street, Edinburgh. The prices are 8s. each in sepia, 7s. each in black.

The President's Approaching Retirement

At the General Meeting on 25 June Mr. ARTHUR KEEN, after the presentation of the Royal Gold Medal to Sir John J. Burnet, referring to the retiring President, said: I have to bring you back to plain English with one or two announcements of forthcoming events; but before doing so it occurs to me to remind you that this is the last occasion on which Mr. Waterhouse will be taking the chair at any of our meetings as President, during his present term of office. I say "his present term" because it is possible that a later period of office might succeed this one. I think we all appreciate—certainly no one appreciates more fully than I do—the value of the services that he has rendered to the Institute during the time that he has held the position of our President. I have been altogether surprised, from time to time, to find how much of his valuable time he was willing and able to devote to the service of his fellow-members here. There is nothing that he has been called upon to carry out that he has not applied himself to with his utmost ability, and with all the time that was necessary to be found for the particular business involved. He has presided over our meetings with the utmost distinction, and there has hardly been an occasion when he has been expected to be here that he has failed to be present. I might speak for a long time without exhausting all the virtues of the President I find in Paul Water-

house, and I do not know that I can do better than remind you that he is a very worthy successor to a very worthy father who held the same position before him. We remember, with the greatest pleasure, his father's tenure of the office, and it will be a very long time before we cease to think with pleasure of the way in which his son has filled the chair. I cannot speak highly enough, or feelingly enough, of the kindness, the consideration, the tact, and the good feeling with which he has conducted the business of our meetings on all occasions; and I think we have to be profoundly grateful to him for all that he has done, not only in the way of carrying on the business of the Institute, but in the way of advancing the very best interests of this great Society. In the matter of education he has distinguished himself exceedingly; he has taken an enormous interest in the business of our Board of Architectural Education, and he has carried the work of that Board to a very high point of efficiency. There is no aspect of the work of this Institute with which he is not fully familiar, and in connection with which he has not carried the work a considerable step further than it had reached before. And I think we have to express ourselves as very, very much indebted to him for all that he has done on our behalf during the time that he has occupied the Chair of this Institute.

CORRESPONDENCE

Registration

The following letter on the subject of Registration has been received by Mr. MacAlister from Mr. Poulter.

13 Arlington Street, St. James's, S.W.1.

14 June 1923.

DEAR MR. MACALISTER,—I am constantly receiving letters and pamphlets on this subject, all too numerous to answer. I wonder whether you could find space in the JOURNAL to give publicity to my views.

I consider that all members of the Institute should have a voice in its conduct, especially now reconstruction is contemplated in the form of Registration. It is, however, disconcerting to find at these times such a lack of unity among architects, also regrettable that some of us are turning into amateur politicians.

The trend now is likely to expose us to possible rupture and to general ridicule, both of which are unlikely to help Registration or the status of the Institute.

If Registration is to come, it must be handled calmly and broadly. One hears a lot of nonsense about Unification and Registration; surely Registration is Unification! If not, what is our case? Are we to ask for a monopoly for a minority? How far will this take us? We must have the support of the majority of all interested in architecture, whether members of the Institute or not, even of those unqualified to practise, if they can show substantial outlay of time and money with the object of becoming architects. I am under the impression that we have their support. If not, our case is hopeless.

I do not hold with the policy of forging blindly ahead, which was seriously put forward at one of the general meetings of the Institute.

Registration seems a subject on which architects might wisely be ignorant, although we are expected to know everything else. By dabbling in this subject, are we not very much like the amateur who tries to be his own architect? The result is well known. An expensive and a prolonged failure.

The best course is to consult the leading authority on Registration, someone with a thorough knowledge of Parliamentary Law, listen to him and allow him to direct our application. A multitude of points will arise, and doubtless difficult opposition will have to be faced and overcome.

I confess I have not the ability nor the time to give the subject the serious thought it deserves, but simple questions such as the following will arise:—

On what grounds do we intend to make the application?

Is it for the betterment of design?

Is it to cheapen building?

Is it to overcome the shortage of housing?

Is it to create more employment for labour?

These are matters which are now in the minds of Members of Parliament, and the question of design is the only easy one to answer.

Then, again, what is meant by the term "Architect"? I am convinced that were all the members of the Institute asked to define that one word, the results would show an amazing diversity of opinion. In framing an Act of Parliament it must be definite. This is of great importance, although it sounds trivial, for we have to contend with and

arrive at an understanding with a great body of many able men, viz., engineers.

In spite of all these difficulties, there is a marked interest being taken in architecture by the general public, and no doubt by careful forethought it may be possible to put forward a case which would be of interest to and protect the general public and at the same time be to the encouragement of architects to carry on the oldest, most noble and necessary of arts.—Yours sincerely,

BRIANT POULTER [F.].

P.S.—It has been publicly stated that the Associates will have a grievance should Registration come into force. Doctors have their different degrees. Why should not architects?

Correspondence

THE ASSOCIATION OF LICENTIATES OF THE R.I.B.A.

3 Queen Street, Cheapside, E.C.

18 June 1923.

To the Editor, JOURNAL R.I.B.A.,—

DEAR SIR,—On behalf of the committee of the above association may I ask for a little space in your next issue to thank all those who have replied to my question with reference to the letter reprinted from the *Builder* of 25 May last.

It is impossible to thank individually the hundreds who have replied. For the moment it will interest the many to know that two Licentiates and two Fellows (who were once Cinderellas) do not agree with us; they are four contented men (two in the glory of the purple and two in the ashes), while 400, including Fellows (once Licentiates) do agree entirely, and many others sympathise.

The committee is grateful to those who, in addition to replying, have sent valuable suggestions which it is hoped may be put before the new Council of the R.I.B.A., and lead, through friendly discussion, to a satisfactory solution of the question at issue, and be one step forward towards unification and peace.—Sincerely yours,

JOHN E. YERBURY [Licentiate].

THE SURVEY OF LONDON.
ST. LEONARD, SHOREDITCH.

21 Lingfield Road, Wimbledon Common, S.W.19.

23 June 1923.

To the Editor, JOURNAL R.I.B.A.,—

DEAR SIR,—On page 500 of the JOURNAL Professor Richardson mentions Eyre's view of Shoreditch.

I have a set of these views of the Fortifications of London, but was informed recently at the British Museum that they are forgeries by a Victorian "architect and builder" named Peter Thompson, who lived near Dorset Square, Regent's Park.

He deceived many of the nobility and literary world from the Prince Consort downwards, including a library of the highest standing.

Architects and other collectors should be on their guard as a number of the "views" are printed on seventeenth or eighteenth century paper.

It is doubtful if "Captain John Eyre" ever existed.—
I am, yours faithfully, F. J. FORSTER [A.].

The Wren Society

Hardly had the bicentenary celebrations abated when a group of admirers of the great architect met together under the shadow of St. Paul's, at the suggestion of Mr. Mervyn Macartney, to devise the means of setting up a permanent and trustworthy record of Sir Christopher Wren's life and work.

It was agreed to form a Wren Society, whose objects should be to hunt out his drawings and other documents—portraits, letters, reports, accounts and miscellaneous documents throwing light upon that long and admirable life and its multifarious activities—and to issue them in published form to subscribers. There is a wide field for such a work. In the first place, Wren's biographers have hitherto been handicapped by a lack of reliable data, and a cloud of mistakes has consequently enveloped his career in obscurity. The depth of the gloom is illustrated by the fact that Sir Lawrence Weaver, whose admirable little book just published has done not a little to dispel it, on checking forty-seven of Miss Milman's dates, "found forty-five of them wrong, by from one to twenty-five years."

Again, the drawings have never been fully catalogued or sifted. Even the splendid All Souls' collection has never been reproduced as a whole, to say nothing of the many other known examples in museums, colleges and Government offices, as well as in private hands, companions to which hitherto unrecorded may well be unearthed by systematic search.

The work of the Walpole, Vasari, Dürer, Henry Bradshaw and similar societies shows what can be accomplished by a body of subscribers animated by a single object, and the Wren Society, which has already received promises of support from many eminent persons and bodies, has every reason to hope that its publications will be equally useful in the cause of art and history and equally full of interest.

These it is proposed to issue annually, over a period of some twenty years, in the form either of portfolios of reproductions of Wren's drawings or other illustrations of his works, or of volumes containing ascertained facts and unpublished records. Experience shows that such publications, in addition to their obvious utility, acquire in course of time a steadily increasing value.

The subscription will be one guinea, and the Society's publications, supplied free to members, will not be obtainable through other channels. Libraries and institutions will receive the same treatment as individuals, and, like them, may pay a Life Composition fee of fifteen guineas.

The Earl of Balfour has exhibited his interest in the Society's work by consenting to become its President.

The Hon. Secretary, Mr. W. H. Ward [F.], 2 Bedford Square, will be pleased to send the prospectus, which will be issued very shortly, to any persons who will supply him with their names and addresses.

The Architecture Club Dinner

There was a good attendance of members and guests at the Architecture Club Dinner, held on 21 June at the Hotel Cecil.

Mr. J. C. Squire, in a speech after the dinner, made the satisfactory announcement that the Club's Exhibition of Architecture, which was held in the spring, had paid its way, and that the same exhibition at Manchester had been visited by 22,000 people. Mr. Squire said further that at the present time they were negotiating with four provincial cities, and it seemed as if the show was going on more or less indefinitely like a travelling circus. They were considering having another one next year, and a great many suggestions had reached them. One was that they should have an exhibition of entirely bad buildings. He thought they might do this without difficulty. Allied to this was a suggestion that they should organise an incendiary branch which should arrange for another Great Fire of London, and that the second one should begin at about the place where the first left off. The originator of this suggestion did not wish to destroy Wren's churches in the City, but beyond the borders of the City there were large areas that might very well be destroyed without injury to anyone except the owners of the property. He could do nothing in public but treat such a suggestion with reprobation and leave it at that. It was, he said, his pleasure to propose the toast of Architecture, coupled with the health of Mr. Curtis Green. When one said architecture one was thinking of the present of architecture and the future of architecture. He would not stand there to drink to the architecture of the past, particularly not within those walls. Mr. Curtis Green, he said, was one of the first members of the club, and he was an architect of whom all who knew his work well approved.

Mr. W. Curtis Green, A.R.A., replying, said it was a very great honour to be asked to respond to architecture. He was afraid he had little to say and nothing amusing. They had been told that architecture was the "Cinderella" of the arts. There was nothing amusing about Cinderella. She was very nice, and she came into her own, and he thought that with so many present that was an indication that architecture was coming into her own. He did think that the number of the faithful and clear-sighted was a growing number, and that the younger men who had been educated since the war had a much better interest in it. He thought we owed a great deal to the schools of Manchester, Liverpool, and the colonies. In speaking of the improvement of architecture, Mr. Curtis Green said he could hear the pessimist say: "How about Regent Street?" The new Regent Street was not being built by the new men: it was being built by the old men, who were trying to catch up the new. Further, there were to-day several living architects who had produced much greater work than any in Nash's time. The garden was full of weeds, but the people had got sight of the flowers in spite of the rapidity with which the weeds grew. They wanted more faithful and educated service. They wanted greater understanding from the public. It was a curious thing that in America all the big buildings went to the big men. Here, if the big buildings went to a prominent man, it was an accident.

WINDOW DESIGN AND THE MEASUREMENT AND PREDETERMINATION OF DAYLIGHT ILLUMINATION

UNDER the auspices of the Illuminating Engineering Society, a joint discussion with members of the Royal Institute of British Architects and the Surveyors' Institution was held at the Royal Society of Arts on Tuesday, 27 March, when a Paper on the above subject was read by Mr. P. J. Waldram, F.S.I., and his son, Mr. J. M. Waldram, B.Sc. Mr. D. R. Wilson, of the Factory Department of the Home Office, presided.

The following is a *précis* of the Paper, which will be published in full in the *Illuminating Engineer*. An appendix explaining the methods of drawing diagrams to ascertain the possible hours of sunshine for windows at any aspect was published in the *Journal of the Surveyors' Institution* of April 1923.

The main object of all investigations into natural illumination is to enable the designer to perform with confidence three operations which at present are directed mainly, if not entirely, by guesswork and rule of thumb :—

(1) So to design windows that interiors are adequately lit for their intended purposes without excessive glass area ;

(2) To determine whether any existing interior is adequately lit ;

(3) To predetermine the degree to which any proposed obstruction will affect the natural lighting of a given interior.

The problems of natural illumination are intricate, but their difficulties are apt to be unsuspected. Even to-day it is somewhat difficult to find an architect or a builder who is not convinced that he knows all that it is necessary to know about illumination by windows. It is still more difficult to find anyone who does.

Our knowledge of these somewhat elusive problems has only been acquired during recent years.

In 1907 there was no illumination-photometer capable of measuring daylight ; its huge fluctuations were almost unrecognised, even by scientists, and the utter impossibility of estimating its varying intensity by the human eye was practically unknown. No co-ordinated theory on the subject had been published, and popular interest in it was small.

To-day we have Government Reports giving the results of a comprehensive series of daylight measurements taken in all classes of factories both by factory inspectors and by scientific investigators from the National Physical Laboratory, carefully collated and published with a clear and concise epitome of accepted theory.

DAYLIGHT FACTOR.

Visual impressions as to the intensity of natural illumination are most deceptive, and can be even absurdly unreliable. Any window or skylight is merely a narrow gateway through which only a very small portion of the sky can throw light into an interior, and as the light obtainable from such a portion of the sky is, *ceteris paribus*, closely related to the visible sky area, it is possible to express the real value of any window under any given conditions of

glass, obstruction, etc., as a fraction of the daylight existing outside ; and such a " daylight factor " has been found to be sensibly constant, at least under the grey and fairly uniform sky of dull days, when the effect of any obstruction of visible sky area is more noticeable and serious. Daylight factors are usually measured by taking practically simultaneous readings at any given point in an interior and on an unobstructed window-sill (sill ratio) or on a roof (roof ratio). Methods are described in the Paper for overcoming the difficulty of a sky of varying brightness.

The Departmental Committee set up by the Home Office early in 1913 to investigate the lighting of factories and workshops disclosed the need for authoritative data. This was duly compiled by the National Physical Laboratory, who reported that the method of measuring by ratios was not only the most reliable, but the only reliable method applicable to daylight illumination.

In spite of large and unsuspected fluctuations, it is therefore now possible to measure daylight and to value it for comparison with recorded averages found sufficient for similar or different purposes.

This is not to say that, merely because methods of measuring daylight have been devised and have proved valuable, our knowledge is either complete or adequate for ordinary requirements. Medical science did not reach adequate finality with the invention of the clinical thermometer. The clinical thermometer greatly assisted the doctor's observation, it did not make his diagnosis for him. The photometer will tell us what we receive under any given conditions ; but it will not tell us how we may obtain the same illumination under different circumstances, nor what we shall obtain if the circumstances be changed.

The only existing methods for predetermining windows are certain well-known rules which purport to determine the area of glass as a proportion of the floor area lit, possibly modified by keeping the window head at a minimum height determined by the depth of the room. Such rules, if correct for cases in which the obstruction of neighbouring buildings is negligible, must necessarily be incorrect for obstructed windows, for any obstruction necessarily alters the essential properties which enable a window to illuminate a room. These are :—

(a) The area, angular height and possibly the aspect of the visible sky at the back of the room or at the worst lit position in the room—which determines the minimum daylight factor due to direct light from the sky ; and

(b) The amount, and possibly the aspect, of the visible sky subtended at the window, which, in conjunction with the colour of the walls and ceiling, determines the contribution to be made to the minimum daylight factor by diffusely reflected light.

The term " visible sky " includes, of course, due allowance for any obstructions which can appreciably reflect light.

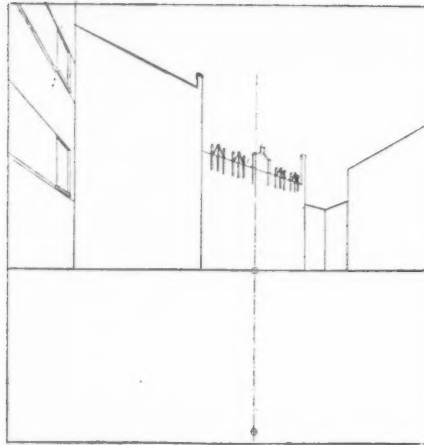


FIG. 1.—TYPICAL PERSPECTIVE VIEW OF OBSTRUCTING BUILDINGS

FLAT PROJECTION OF SKY—ASPECT SEEN ZENITH

WINDOW N° B—FLOOR

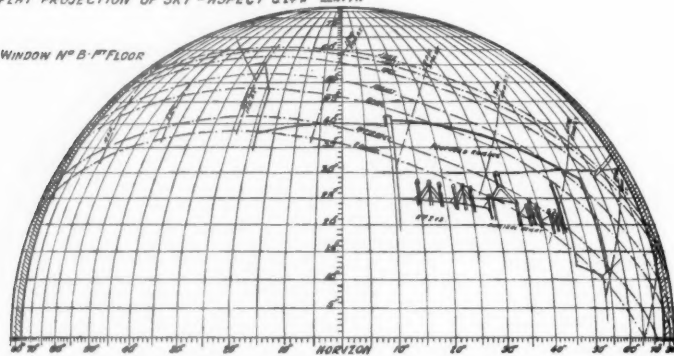


FIG. 2.—TYPICAL DIAGRAM SHOWING LOSS OF SUN DUE TO OBSTRUCTIONS

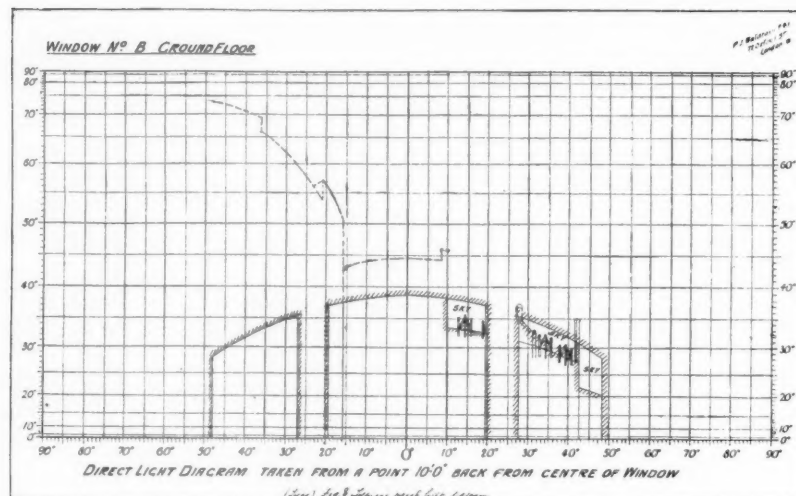


FIG. 3.—TYPICAL DIRECT LIGHT DIAGRAM

WINDOW DESIGN

Except in crowded towns, it is generally not difficult to light all interiors adequately by means of windows of moderate size and height without spoiling the balance of fenestration in adjoining elevations or incurring the disadvantage of excessive glass area.

This is rather apt to engender in the designer a misleading sense of ability to deal with all situations which may occur. It is only when he encounters cases of severe sky obstruction coupled with deep rooms and the necessity or desirability of retaining a small window area that he feels the need of more exact methods of predetermining daylight problems, for a mistake, once made, is generally irrevocable.

The object of this Paper is to supply that want. It is assumed that the dimensions of the interior, the window and the obstructions have all been fixed, and that it is necessary to ascertain whether those conditions will result in an adequate daylight factor at the worst lit point, or at any number of doubtful points in the interior.

It is thus at present mainly a trial and error method, and although, with its help, it may prove to be possible at a later date to formulate general rules giving the window dimensions necessary under any combinations of circumstances, the labour involved in arriving at such rules will necessarily be heavy.

The following summary of the operations necessary in any particular case will serve to indicate their simple character:—

(1) *Direct Light*.—From the worst lit positions in the given interiors, or from any number of doubtful positions, the sky visible through the window, windows or skylight over any obstructions which may be present is plotted on to a suitable measuring diagram, representing the quarter sphere of visible sky. The angular divisions of this sky diagram are so adjusted as to represent by the area of any piece of the visible sky its power of illuminating a surface at the point under consideration. Plotting can usually be done from the plans and sections, but the rather tedious work involved can be greatly reduced by the judicious use of simple trigonometry and by the aid of perspective projection.

The direct light factor is then obtained simply by comparing the area of visible sky with the area of the whole diagram.

(2) *Diffused Light*.—To the above must be added the contribution made by diffusely reflected light. We certainly require much more and much better data of this, but it can generally be estimated as lying between the limits of 1 per cent. (sill ratio) in the case of exceptionally shallow rooms with large windows and nearly white walls, about 0.4 to 0.5 per cent. in ordinary rooms with light walls and ceilings and small obstruction, and well below the grumble point of 0.4 per cent. sill ratio when the obstruction is material.

Diffused light, which appears to be approximately constant over all parts of an ordinary room, may be estimated by plotting on to a diagram similar in form but somewhat different in construction to that used for estimating direct light.

(3) *Sunlight*.—The hours of possible sun which can enter the room can be ascertained by plotting on to a

simple flat projection of the sky opposite the window, together with the apparent paths of the sun at different periods of the year across that sky, the sun paths being properly divided into periods of time.

If the result indicated proves to be insufficient or excessive, the diagrams show at once in what particulars any of the assumed conditions can most effectively be varied.

Figs. 2 and 3 illustrate the projection on to a sun and on to a direct light diagrams respectively of a group of buildings opposite to a window and shown in perspective in Fig. 1 in order to ascertain the effect of a proposed raising.

It should be emphasised that methods of measurement only serve to assist our judgment—they will not do our thinking for us. The clinical thermometer helps the doctor to use his medical knowledge and experience with more assured accuracy, but it does not supply the place of either qualification, for no two medical cases are exactly similar.

However great, therefore, may be the degree of accuracy to which we may bring methods of measuring and predetermining daylight, they can never take the place of intelligent observation, experience and judgment, for no two cases of lighting ever present the same features.

The improvement of cases of bad natural lighting is invariably attempted on the general lines of making the most of what sky is left. Light coming from the sky at too steep an angle to enter the window or at least to penetrate far into the room is caught on inclined mirror reflectors placed outside the window and directed more or less horizontally into the room.

The same effect is obtained by the use of prismatic glass either glazed in the window sashes or used in the form of independent outer sashes inclined at a suitable angle to effect the desired refraction.

Much care has been directed to the production of these prismatic glasses, of which some excellent kinds (Luxfer, Pilkington's, etc.) are on the market, and when properly installed they can undoubtedly effect remarkable improvements in the lighting of basements and of rooms at the bottom of deep light wells.

Where light is required mainly in a horizontal direction as in basement stores, they are excellent; but for clerical work the unnaturally horizontal direction which they give to the light and their tendency to specular reflection and glitter are undoubtedly bad, and rooms lit with them should always be so arranged and furnished that the occupants shall normally work with a side light.

Mr. J. W. T. Walsh, of the National Physical Laboratory, said they were indebted to the authors for the new tools which they had described. He was particularly interested in the formula given in the Paper for predetermining the light from a window. He had applied it to actual cases together with the very long and intricate exact formula from which the authors had saved them. The difference between the two was extremely small. The formula would be of considerable use to them at Teddington, where they were carrying out investigations on parallel lines to those described in the paper. With reference to Mr. Waldram's comments on the N.P.L. method of measuring the light in existing buildings, he pointed out that, although there was undoubtedly something to be said in favour of comparing

the inside light with direct observations of the sky brightness, difficulties would occur in factories where none of the windows could be opened and a measurement made only through the glass which might be affected by varying degrees of absorption due to dirt on the glass.

Mr. G. F. Collinson, F.R.I.B.A., asked whether there were any foundation for a suggestion which had been made to him that light outside the sun's rays was stronger than the sunlight itself.

Mr. R. Langton Cole, F.R.I.B.A., asked for a fuller explanation of the statement that diffused light represented 1 per cent. of the sill light. He questioned the accuracy of representing the sky as a spherical surface. He thought there was some danger of Chancery Judges in ancient light cases being unduly influenced by abstruse formulæ.

Mr. J. Macintyre (H.M. Office of Works) expressed the hope that the Paper would induce architects to design windows for their real purpose rather than as features in an elevation. He regretted that the authors had not dealt with the problems of light wells.

Mr. A. Blok asked for information as to the loss of light due to dirt on glass. He had recently found by actual measurement a loss of 25 per cent. between clean windows and those with two months' dirt left on them.

The Chairman, in proposing a vote of thanks to the authors, mentioned that 75 per cent. of industrial operations were carried on by daylight, the problems of which had not in the past received the close study which had been devoted to those relating to artificial illumination.

Mr. Leon Gaster, seconding the vote of thanks, referred to the reports on the Lighting of Schools, by a committee appointed by the Society in 1913, and to the fact that one of the authors had been carrying out research on daylight for some years. He emphasised the need and the difficulty of regulations as to the cleaning of factory windows.

Mr. P. Waldram, replying to the discussion, pointed out that the small error, noted by Mr. Walsh, involved in attempting to calculate the light from a window opening by the formula used in setting out the measuring diagram was automatically corrected when the opening was plotted on the diagram. There was no need to use any formula; the diagram did all the calculation necessary.

He agreed that there were exceptional factories where the new method of measuring existing light could not be used; but suggested that the number of those in which the new method could be used and the old method could not was still larger.

The phenomenon referred to by Mr. Collinson was doubtless the fact, not so generally known as it deserved to be, that the light from white clouds was stronger than that received from unclouded blue sky. The actual rays of the sun were, of course, the most powerful illuminant they had.

Replying to Mr. Langton Cole, the proportion of the total light in an ordinary room which was contributed by diffuse reflection from walls and ceilings might under favourable circumstances amount to as much as 1 per cent. of the light incident on an unobstructed window-sill from a full quarter sphere of sky. This would be the same as the minimum permissible light on the desk of a schoolroom for young children, and about $2\frac{1}{2}$ times the minimum at which reasonable adults would grumble.

He did not share Mr. Langton Cole's fear that Chancery Judges might be hypnotised by formulæ or by scientific methods. His experience was that they consistently refused to be influenced by anything which they had not thoroughly grasped. They sometimes proved to be extremely acute. In illustration he instanced one occasion when a highly complicated mathematical diagram had puzzled every expert in court, and even its author was obviously in difficulties. The Judge suggested that it became fairly obvious if one corrected what appeared to him to be a draughtsman's error in lettering, and this proved to be the case.

He regretted that the unavoidable length of the Paper had prevented the inclusion of the interesting but complicated subject of light wells referred to by Mr. Macintyre.

Mr. Blok's figures for absorption of light by dirt on glass were by no means abnormal. Clean sheet glass absorbed from 7 per cent. to 10 per cent. of light, according to thickness and quality, but absorption increased rapidly with dirt. Two months' dirt would easily raise the figure to 25 per cent. without the glass looking particularly neglected.

Mr. J. M. Waldram, replying to Mr. Langton Cole's objection, showed that the sky could be treated as a spherical surface, a flat plane of infinite extent, or as any other shape, provided due allowance were made in the formula.

At the conclusion of the discussion a number of specimens of different kinds of window glass, clean and dirty, with their absorption coefficients, were exhibited.

FIFTY YEARS OF BIRMINGHAM ARCHITECTURE.

By GEORGE DRYSDALE [A.].

An interesting exhibition of architectural photographs and drawings has just been brought to a successful close at the rooms of the Society of Artists in Birmingham.

The exhibition was organised to celebrate the jubilee of the B.A.A., and to bring before the public the work done by local architects during the last fifty years. It also comprised illustrations of buildings erected in Birmingham from the designs of outside architects.

"A survey of the architectural designs produced during the last fifty years arouses mixed feelings. Broadly speaking, the period was a bad one for art generally, and while recognising the good work of a few gifted men, it must be admitted that the output during this period was distinctly poor. The poor average of design is attributable in part to the then prevailing standards of architectural taste, but still more to the inadequate professional training of the average architect. During the latter part of this period there were signs of marked improvement, both in standards of taste and in architectural education—an improvement that is increasing progressively at the present time. Birmingham architects are now producing many designs of good average merit, and some of marked ability, and the practitioners of this area stand high in the estimation of the profession."

The exhibition contained work in every style and manner, as was natural, embracing as it did a period of fashions ever changing. Generally speaking, the designs grow more severe as they become modern, great care being taken in

ROME SCHOLARSHIP

the management of detail, the spacing of the unit, colour and texture. This later desire for severity has its dangers, however, a flatness sometimes, a four squareness of contour and skyline. Birmingham architects are to be congratulated on the careful study they are making of their brick-work. This was the distinctive quality of the exhibition, and was emphasised in the numerous studies in Byzantine Romanesque church architecture and in the many highly successful designs for factory buildings.

The position of honour on the walls of the exhibition was given to the drawings and photographs illustrating the work of Mr. W. H. Bidlake, that "guide, philosopher and friend" of anyone interested in architecture, that natural help of the young Birmingham architect. Whether the medium be pencil, ink or water-colour, his drawings are always delightful, as were the all too few photographs he sent showing work carried out.

SIR ASTON WEBB, P.R.A.

An honorary doctor's degree was conferred on Sir Aston Webb, President of the Royal Academy, by Cambridge University on 12 June.

Presenting Sir Aston Webb, the Public Orator said that the Roman poet had said, "God was the first architect," and among men there were hardly any who could more securely hope for the eternity of their works, as they learned every day from Egypt and Assyria. Among the monuments of their generation posterity would assuredly find the name of Sir Aston Webb. Son of a distinguished painter, he took to the pencil and planned palaces and museums; not merely planned them, but what his mind conceived he saw rendered in stone. Before the doors of the King stood the marble cenotaph of Queen Victoria, the work of this man's art. The Palace of the King himself knew his hand of genius, and in Cambridge his work was to be found with its marks of clearness and simplicity.

DINNER TO PROFESSOR BERESFORD PITE, M.A. [F.].

Old students and the professional confrères and friends of Professor Pite will welcome the announcement that it has been arranged to hold a dinner in his honour on his retirement from the Professorship of Architecture at the Royal College of Art, as an acknowledgment of his services in the cause of art education.

Professor Pite was appointed to the School of Art in October 1900, at the same time as the appointments of Professor Lethaby and Professor Moira at South Kensington, so that he retires at the end of twenty-three years' occupancy of the professorial chair.

Professor Pite will continue his private practice and will still hold the Architectural Directorship of the L.C.C. School of Building at Brixton. His lectures at the School of Architecture at Cambridge will, of course, be also continued.

The dinner will be given at Pagani's Restaurant,

Great Portland Street, W., on Friday evening, 20 July. Applications for tickets (7s. 6d.) should be made to Mr. L. M. Austin [A.], who is acting as Hon. Secretary, Royal College of Art, South Kensington.

ROME SCHOLARSHIP AND HENRY JARVIS STUDENTSHIP FOR 1923.

On the recommendation of the Faculty of Architecture of the British School at Rome, the Commissioners of 1851 have awarded the Rome Scholarship in Architecture for 1923 to Mr. R. A. Cordingley, A.R.I.B.A., of the University of Manchester; and on the recommendation of the same body the Henry Jarvis Studentship, offered by the Royal Institute of British Architects, has been awarded to Mr. Edwin Williams, A.R.I.B.A., of the University of Liverpool.

Mr. R. A. Cordingley is 27 years of age and was born at Sale, Cheshire. From 1911 to 1914 he was architectural pupil with Mr. Robert J. McBeath, of Sale, and attended the evening course at the Manchester Technical College. He served for four years during the war in the Royal Engineers and Air Force, and in 1919 entered the School of Architecture of Manchester University, winning the Henry Jarvis Travelling Studentship in 1920 and 1921 and the Manchester Institute of Builders Travelling Scholarship in 1922, when he was also elected an Associate of the Royal Institute of British Architects.

Mr. Edwin Williams, who is awarded the Henry Jarvis Studentship, is 26 years of age and is a fifth-year student of the School of Architecture of Liverpool University. He has held the Henry Jarvis Travelling Studentship of the Royal Institute of British Architects and the Lever Prizes in Architecture and Civic Design. Mr. Williams served for four years during the war in the 55th West Lancs Division. He was elected an Associate of the Royal Institute of British Architects in 1921.

With reference to the above awards, Sir Evelyn Shaw, the Hon. General Secretary of the British School at Rome, writes under date of the 27th June:

A resolution was passed by the Faculty of Architecture with reference to the drawings submitted in the Final Competition for the Rome and Jarvis Scholarships for 1923, as follows:—

"The Faculty regret to notice that competitors allow themselves far too great a licence in deviating from their esquisses, and in some cases the esquisses are so vague that they are of little or no value in indicating the competitors' designs. In any future competition the main lines and general composition of the design as shown in the esquisse must be adhered to in the finished design. Failure to adhere to this condition will in future render competitors ineligible."

THE WREN MEMORIAL VOLUME AND THE U.S.A.

Mr. Whitaker, in his notes on the Fifty-sixth Convention of the American Institute of Architects in the Journal of the American Institute, states that "previous to the Convention the Board of Directors authorised the acceptance of the proposal that the American Institute become, through its Press, the distributing agent in United States for the Memorial Volume on Sir Christopher Wren, issued in coincidence with recent bicentenary observance of his death."

JOURNAL OF THE ROYAL INSTITUTE OF BRITISH ARCHITECTS

NOTES FROM THE MINUTES OF THE COUNCIL MEETING, 11 JUNE 1923. THE WESTERN AVENUE.

It has been decided by the Council to urge the Ministry of Transport and the Middlesex County Council to exercise their powers under the Development and Road Improvement Funds Act, 1909, to purchase immediately a strip of land of a width up to 440 yards in all in connection with the construction of the Western Avenue.

TREATMENT OF WASTES IN RURAL DISTRICTS.

It has been decided by the Council to urge the Ministry of Health to consider the issue of an Appendix to their present Model By-Laws to the effect that in Rural Districts where the number of cottages does not exceed eight to the acre, such cottages should be exempt from the By-Laws respecting the prescribed treatment of the wastes from sculleries and sinks.

THE ASSOCIATION OF TRANSVAAL ARCHITECTS.

The Association of Transvaal Architects has been formally admitted to alliance with the R.I.B.A.

THE BRITISH SCHOOL AT ROME.

Sir Reginald Blomfield, R.A., has been reappointed for a further period of three years to represent the R.I.B.A. on the Council of the British School at Rome.

Notices

VISIT ARRANGED BY THE ART STANDING COMMITTEE.

A visit has been arranged, by kind permission of the architects, Messrs. Helmle and Corbett, to Bush House, Aldwych, on Saturday afternoon, 14 July 1923. Members and Licentiates who desire to attend are requested to apply to the Secretary R.I.B.A. not later than Thursday, 12 July 1923.

ELECTION OF MEMBERS, 3 DECEMBER 1923.

Associates who are eligible and desirous of transferring to the Fellowship Class are reminded that if they wish to take advantage of the Election to take place on 3 December they should send the necessary nomination forms, etc., to the Secretary R.I.B.A., 9 Conduit Street, W.1, not later than 29 September 1923.

THE HOUSING TRIBUNAL.

The Housing Tribunal appointed by the Institute to deal with cases for fees in connection with Abandoned Housing Schemes give notice that they cannot consider any further cases submitted after 14 July.

Mr. Ernest Ravenscroft, Licentiate R.I.B.A., has been appointed Diocesan Surveyor for Berkshire.

Members' Column

MR. T. YOXALL.

MR. T. YOXALL [A.] has commenced practice at Courier Buildings, 31 Market Street, Longton, Staffs.

PRACTICE FOR SALE.

ARCHITECT wishes to dispose of sound practice in W.R., Yorks; established 20 years; covering wide variety of work. Moderate price to purchaser competent to take over work in progress.—Box 2063, c/o Secretary R.I.B.A., 9 Conduit Street, London, W.1.

OFFICE TO LET.

ARCHITECT, Charing Cross, has furnished room to let; sole use; also combined office facilities; telephone. Moderate rent.—Apply Box 2163, c/o Secretary R.I.B.A., 9 Conduit Street, London, W.1.

PARTNER OR PUPIL.

ARCHITECT (A.R.I.B.A.), with small practice, South Coast, desires to meet young architect with view to partnership, or would be willing to take pupil.—Apply Box 923, c/o Secretary R.I.B.A., 9 Conduit Street, W.1.

OFFICE WANTED.

A.R.I.B.A. desires share of office—preferably West End address—part assistance given.—Box 2563, c/o Secretary R.I.B.A., 9 Conduit Street, W.1.

APPOINTMENT WANTED.

ASSOCIATE (35), with all-round experience, including quantities, desires position as Leading Assistant, preferably with prospect of Partnership or working arrangement. Keen worker; moderate capital; London or Provinces.—Apply Box 435, c/o Secretary R.I.B.A., 9 Conduit Street, W.1.

ASSISTANT WANTED.

AN ASSISTANT ARCHITECT is required for a firm of architects and surveyors practising in Singapore and Colombo. Public School and ex-Service man preferred. Age 25-30. A sound knowledge of construction, quantities, reinforced concrete, and perspectives desirable. Salary, Rs. 1,000 per month. Six months' trial with a view to an agreement for 2 or 3 years. Applications should be addressed to the Secretary R.I.B.A., 9 Conduit Street, London, W.1. A good Clerk of Works is also required for the above firm. Applications, stating age, experience, salary required and references, should be addressed to the Secretary R.I.B.A., 9 Conduit Street, London, W.1.

MR. C. G. BOUTCHER.

MR. C. G. BOUTCHER, F.R.I.B.A., is home on leave for 3 months from Malay States. Any letters for him should be addressed care of the Secretary R.I.B.A., 9 Conduit Street, London, W.1.

PARTNERSHIP WANTED.

F.R.I.B.A. desires partnership in busy office; 28 years' exceptionally wide and varied experience, home (including London) and Continental.—Apply Box 9428, c/o Secretary R.I.B.A., 9 Conduit Street, W.1.

NEWARK R.E. OFFICERS.

CAPTAIN H. W. LOCKTON, R.E., 24 Castle Gate, Newark, will be pleased to receive names and addresses of Officers who were stationed at Newark during the war, as it is probable a reunion will take place in the autumn.

Minutes XVIII

SESSION 1922-1923.

At the Sixteenth General Meeting (Ordinary) of the Session 1922-1923, held on Monday, 25 June 1923, at 8.30 p.m., Mr. Paul Waterhouse, President in the chair. The attendance book was signed by 38 Fellows (including 12 Members of the Council) and 32 Associates (including 2 members of the Council), 2 Licentiates and a very large number of visitors.

The Minutes of the Meeting held on 11 June 1923, having been published in the JOURNAL were taken as read, confirmed and signed by the President. The following member attending for the first time since his election was formally admitted by the President:—

James Gray [A.]

The President delivered an Address on the Presentation of the Royal Gold Medal to Sir John James Burnet, A.R.A., R.S.A. [F.].

Having been invested with the Medal, Sir John Burnet expressed his thanks for the honour conferred upon him and delivered a brief Address.

Monsieur J. Godefroy (S.A.D.G.), Vice-President of the Franco-British Union of Architects, and Monsieur G. Legros, President of the Société des Architectes Diplômés par le Gouvernement, also spoke.

The proceedings closed at 9.30 p.m.

